LIPPINCOTT LIBRARY
MAR 6 1956
BIOGRAPHY & INDUSTRY

The EDISON ELECTRIC INSTITUTE BULLETIN

February 1956

Sales and Accounting Conference Programs

Public Relations Practices
Dan E. Karn

Hells Canyon
A. C. Inman

Philosophy of Reading
Ralph M. Besse

New England Flood Control
Clarence W. Mayott

Estimating Meter Readings

Let's Close Ranks and Sell
W. V. O'Brien

Published Monthly by Edison Electric Institute

ELECTRICAL RESEARCH STATISTICS
THE ELECTRIC LIGHT AND POWER INDUSTRY

Current Statistical Data Covering 100 Per Cent of Industry

(Includes Investor-Owned Companies, Cooperatives, and Government-Owned Utilities)

November, 1954-1955

SOURCE AND DISPOSAL OF ENERGY—MONTH OF NOVEMBER

	1955	1954	%
NET GENERATION* (Kwhrs in Thousands)			
By Fuel Burning Plants	38,542,977	32,093,003	+20.1
By Water Power Plants	9,208,329	8,116,367	+13.5
Total Generation	**47,751,306**	**40,209,370**	**+18.8**
Add—Net Imports Over International Boundaries	190,919	240,320	−20.6
Less—Company Use	132,656	124,451	+ 6.6
Less—Energy Used by Producer	1,050,587	604,153	+73.9
Net Energy for Distribution	**46,758,982**	**39,721,086**	**+17.7**
Lost and Unaccounted for	5,070,974	4,328,636	+17.1
Sales to Ultimate Customers	**41,688,008**	**35,392,450**	**+17.8**

CLASSIFICATION OF SALES

NUMBER OF CUSTOMERS—As of November 30th			
Residential or Domestic	44,299,368	43,038,760	+ 2.9
Rural (Distinct Rural Rates)	1,651,260	1,637,550	+ 0.8
Commercial or Industrial:			
Small Light and Power	6,047,236	5,990,530	+ 0.9
Large Light and Power	288,987	281,831	+ 2.5
Other Customers	170,581	164,348	+ 3.8
Total Ultimate Customers	**52,457,432**	**51,113,019**	**+ 2.6**
KILOWATTHOUR SALES—During Month of November (Kwhrs in Thousands)			
Residential or Domestic	10,073,138	9,200,021	+ 9.5
Rural (Distinct Rural Rates)	770,207	720,449	+ 6.9
Commercial or Industrial:			
Small Light and Power	6,738,208	6,140,701	+ 9.7
Large Light and Power	22,363,964	17,694,213	+26.4
Street and Highway Lighting	422,286	389,255	+ 8.5
Other Public Authorities	882,912	812,819	+ 8.6
Railways and Railroads:			
Street and Interurban Railways	218,257	219,418	− 0.5
Electrified Railroads	172,383	171,642	+ 0.4
Interdepartmental	46,653	43,932	+ 6.2
Total to Ultimate Customers	**41,688,008**	**35,392,450**	**+17.8**
Revenue from Ultimate Customers (Thousands)	**$681,561**	**$620,428**	**+ 9.9**

RESIDENTIAL OR DOMESTIC SERVICE

AVERAGE CUSTOMER DATA—For 12 months ended November 30, 1955			
Kilowatthours per Customer	2,728	2,529	+ 7.9
Average Annual Bill	$72.29	$68.28	+ 5.9
Revenue per Kilowatthour	2.65¢	2.70¢	− 1.9

* By Courtesy of the Federal Power Commission.

THE EDISON ELECTRIC INSTITUTE BULLETIN is published monthly by the Edison Electric Institute, an association of electric light and power companies in the United States and its territorial possessions. Its affiliate members consist of members of the Canadian Electrical Association.

The objectives of the Edison Electric Institute are:

The advancement in the public service of the art of producing, transmitting, and distributing electricity and the promotion of scientific research in such field.

The ascertainment and making available to the members and the public of factual information, data, and statistics relating to the electric industry.

To aid its operating company members to generate and sell electric energy at the lowest possible price commensurate with safe and adequate service, giving due regard to the interests of consumer, investor, and employee.

•

Closing date for the BULLETIN is the tenth of the month preceding the month of issue.

Manuscripts and correspondence relating to the BULLETIN should be addressed to the Editor, Edison Electric Institute, 420 Lexington Avenue, New York 17, N. Y.

The Edison Electric Institute does not assume responsibility for, nor necessarily endorse or approve, statements made by contributors to the BULLETIN.

•

Subscription price of the BULLETIN is $2.00 per year in the United States; $3.00 per year in foreign countries.

Entered as second-class matter, August 17, 1933, at the post office at Philadelphia 2, Pa., under the act of March 3, 1879. Publication office, 56th and Chestnut Sts., Philadelphia 39, Pa. Editorial office, 420 Lexington Ave., New York 17, N. Y. Volume 24, No. 2. 1956.

The EDISON ELECTRIC INSTITUTE BULLETIN

February, 1956

Vol. 24 No. 2

Articles, Speeches, Reports

22nd Annual EEI Sales Conference to Emphasize Modernized Wiring 35

Cost Reduction Theme for 1956 EEI-AGA Accounting Conference 38

Utility Public Relations Practices
Dan E. Karn 39

Hells Canyon—Politics or Power
A. C. Inman 42

Telecast Launches Industry Promotion of Residential Electricity, Electrical Products 47

The Philosophy of Reading
Ralph M. Besse 48

The New England Flood Control Story
Clarence W. Mayott 50

Estimating Meter Readings for Final Bills 53

Let's Close Ranks and Sells
W. V. O'Brien 55

Five More Resuscitations Win EEI Medals 60

News, Notes, Miscellany

Landscaping Beautification Award Won by Rochester Gas and Electric Corp. 37

Operation Home Improvement Begins; 1956 Proclaimed Home Improvement Year 46

1½ Million Pieces of Educational Literature Distributed by BLBS in 1955 59

Personals 64

CONVENTIONS AND MEETINGS

1956

MARCH

12-14 Southeastern Electric Exchange Annual Conference, Boca Raton Hotel, Boca Raton, Fla.

12-16 NEMA Winter Meeting, Edgewater Beach Hotel, Chicago, Ill.

15-16 EEI Industrial Relations Committee, Muehlebach Hotel, Kansas City, Mo. Jointly sponsored with Personnel Administration Committee of Missouri Valley Elec. Assn., Personnel Committees of Iowa Utilities Assn., No. Central Elec. Assn., and Southwestern Personnel Group.

18-21 ASME Spring Meeting, Multnomah Hotel, Portland, Ore.

19-21 CEA West Division Meeting, Macdonald Hotel, Edmonton, Alta.

22-23 PCEA Engineering and Operating Section, Palace Sheraton, San Francisco, Calif.

22-23 Oklahoma Utilities Association Annual Convention, Biltmore Hotel, Oklahoma City, Okla.

23-24 EEI Street Lighting Committee, Minneapolis, Minn.

26-29 22nd Annual EEI Sales Conference, Edgewater Beach Hotel, Chicago, Ill.

APRIL

4- 5 16th Annual Young Men's Utility Conference, Hotel Van Orman, Fort Wayne, Ind.

6 Maryland Utilities Association Annual Business Conference, Lord Baltimore Hotel, Baltimore, Md.

11-13 Northwest Electric Light and Power Association, Engineering and Operating Section, Hotel Vancouver, Vancouver, B. C.

16 EEI Advisory and Executive Committees, Hotel Commodore, New York, N. Y.

16-18 EEI-AGA National Conference of Electric and Gas Utility Accountants, Hotels Commodore and Biltmore, New York, N. Y.

18-19 Pacific Coast Electrical Association, Administrative Services Section, Huntington Sheraton Hotel, Pasadena, Calif.

18-20 Missouri Valley Electric Association, Engineering Conference, President Hotel, Kansas City, Mo.

19 EEI Industrial Relations Committee, EEI Headquarters, New York, N. Y.

29-May 1 Rocky Mountain Electrical League Annual Fall Convention, Broadmoor Hotel, Colorado Springs, Colo.

30-May 2 EEI Engineering Committees, Edgewater Beach Hotel, Chicago, Ill.

30- 1 Electrical Equipment and Meter and Service

30- 2 Prime Movers

1- 2 Transmission and Distribution and Hydraulic (tentative)

MAY

2- 4 EEI Accident Prevention Committee, Coronado Hotel, St. Louis, Mo.

4 NARUC Executive Committee, Leamington Hotel, Minneapolis, Minn.

7- 9 EEI Purchasing and Stores Committee Annual Meeting, Sheraton Plaza Hotel, Boston, Mass.

7- 9 Air Conditioning and Refrigeration Institute Annual Meeting, Homestead, Hot Springs, Va.

1956

8 EEI Commercial Electric Cooking Conference, Sheraton Hotel, Chicago, Ill.

9 ECAP Copy Group Meeting, Philadelphia, Pa.

10-11 PUAA Annual Convention, Philadelphia, Pa.

14-16 Pacific Coast Electrical Association Annual Convention, Las Vegas, Nev.

17 EEI Industrial Relations Committee, Willis E. Hughes Memorial, Rochester, N. Y.

17-18 PEA Electrical Equipment Committee and Relay Committee, Hotel Wm. Penn, Pittsburgh, Pa.

21 EEI-AGA Orientation Meeting, Headquarters, New York, N. Y.

21-23 Northwest Electric Light and Power Association, Business Development and Personnel Section Meeting, Benjamin Franklin Hotel, Seattle, Wash.

28-29 Arkansas Power & Light Co. Dealer Coordination Committee Southeastern Area Workshop, Arlington Hotel, Hot Springs, Ark.

JUNE

4- 6 24TH ANNUAL EEI CONVENTION, ATLANTIC CITY, N. J.

17-18 PEA Electrical Equipment and Relay Committees, Hotel Wm. Penn, Pittsburgh, Pa.

17-21 ASME Semi-Annual Meeting, Statler Hotel, Cleveland, Ohio

17-22 59th Annual Meeting American Society Testing Materials and 12th Apparatus Exhibit, Chalfonte-Haddon Hall, Atlantic City, N. J.

18-20 American Society Heating and Air-Conditioning Engineers, Semi-Annual Meeting, Washington, D. C.

18-20 Canadian Electrical Association Annual Convention, Manoir Richelieu, Murray Bay, P. Q.

21-23 Northwest Electric Light and Power Association, Accounting and Business Practice Section, Multnomah Hotel, Portland, Ore.

24-26 Wisconsin Utilities Association Accounting Section Convention, Schwartz Hotel, Elkhart Lake, Wis.

24-27 Michigan Electric Association Annual Convention, Grand Hotel, Mackinac Island, Mich.

25-29 American Society for Engineering Education Annual Meeting, Iowa State College, Ames, Iowa

25-29 American Institute of Electrical Engineers, Summer and Pacific General Meetings, San Francisco, Calif.

JULY

16-21 International Organization for Standardization Council Meeting, Geneva, Switzerland

24-27 NARUC Annual Convention, Sheraton Palace, San Francisco, Calif.

SEPTEMBER

13-14 EEI Organization Meeting, Edgewater Beach Hotel, Chicago, Ill.

17-19 EEI Industrial Relations Annual Round Table Conference, Drake Hotel, Chicago, Ill.

17-21 IES National Technical Conference, Hotel Statler, Boston, Mass.

26-28 PIP Workshop Conference, Blackstone Hotel, Chicago, Ill.

The EDISON ELECTRIC INSTITUTE
BULLETIN

22nd Annual EEI Sales Conference to Emphasize Modernized Wiring

MODERNIZED wiring—the roadway to electrical living—will receive the careful scrutiny of the industry's commercial representatives when they convene for the 22nd Annual EEI Sales Conference at the Edgewater Beach Hotel in Chicago, Ill., on March 26-29. The attention of outstanding speakers will be directed toward both residential and industrial wiring. HOUSEPOWER, the new advertising and publicity program aimed at the wiring bottleneck in the American Home, and the "Live Better . . . Electrically" program—two of the nation-wide activities which incorporate wiring promotion as an aid to local companies in facilitating all future electrical sales—will be explained in detail to the group.

The entire program, arranged by the EEI Commercial Division, directed by O. R. Doerr, Vice President, Pacific Gas and Electric Co., and Chairman of the EEI Commercial Division Executive Committee, has been arranged to stress the importance of making wiring and HOUSEPOWER the principal concern of electric companies during 1956.

Individual Committee Meetings

The first day of the conference—Monday, March 26—will be devoted to individual meetings of the 21 Commercial Division Committees. On Tuesday, the Farm, Residential, Commercial Sales, and Industrial Power and Heating Groups will be in session all day. During the morning, while the Farm and Residential Groups are in joint meeting, the Commercial Sales and Industrial Power and Heating Groups will hold individual meetings. The latter two groups will meet jointly then during the afternoon, while the former groups will have individual meetings at that time.

O. R. DOERR
Chairman of the Commercial Division Executive Committee

First General Session

Opening the first general session, on Wednesday morning, will be introductory remarks by Chairman Doerr. Mr. Doerr, who will preside over the general sessions, will review the work of the EEI Commercial Committees during the past year and will describe the commercial activities for 1956, including those activities which are in operation as well as those proposed. He will also make a brief introduction of the HOUSEPOWER program.

Harllee Branch, Jr., President of the Institute and President of Georgia Power Co., will address the conference delegates at this first general session. He will present an authoritative statement on the general status of the electric industry, emphasizing the place of commercial activities in continuing to raise the industry's position in the future.

"The Future of the Electric Industry," an appraisal of opportunities and possibilities for growth, will be made by Fischer Black, Editor and Publisher of *Electrical World.* The final speaker at the Wednesday morning general session will be E. O. George, Manager of Sales for The Detroit Edison Co. and Chairman of the EEI Wiring Promotion Committee, who will describe in detail the HOUSEPOWER program.

Awards Luncheon

An innovation in the conference this year is the Awards Luncheon, which will be held at noon on Wednesday in the Polynesian Room. G. W. Ousler, Vice President of Duquesne Light Co. and Chairman of the EEI Prize Awards Committee, will preside at the luncheon which is open to all delegates and admission for which is included in the registration fee. Winners will be announced and prizes presented at that time for the following competitions: Laura McCall Awards for home service achievements, George A. Hughes Awards for electric appliance sales and promotion to develop electric cooking and water heating loads, George Westinghouse Awards for promotion of electric laundry equipment, Better Light Better Sight Bureau Awards for lighting education, Lighting Promotion

Awards for lighting promotional activities in the residential and commercial-industrial markets, More Power to America Awards for achievements in industrial electrification, Thomas W. Martin Award for rural electrification, and the Frank Watts Awards for promotion of electrically-operated farm equipment.

Second General Session

To open the second general session, on Wednesday afternoon, W. V. O'Brien, General Electric Co., will explain the "Live Better . . . Electrically" program. This broad industry movement is designed to stimulate participation by manufacturers, home builders, contractors, architects, electrical distributors, dealers, realtors, and lending institutions in selling the benefits of increased electrification to the American home owner.

J. W. McAfee, President of Union Electric Co. of Missouri, will speak at this session on "What Management Expects from the Sales or Commercial Department," and Frank W. Lovejoy, Socony Mobil Oil, will address the group on "Dynamic Selling in the Age of Automation."

Third General Session

The President of Westinghouse Electric Corp., Gwilym Price, will be the initial speaker at the third session on Thursday morning. His topic will be "Automation in the Future of Industry." Edwin Vennard, who is scheduled to become Vice President and Managing Director of the Institute on June 1, 1956, will speak at this session on "How Can We Double Our Residential Load in Ten Years."

"What Does the Investor Expect from his Electric Utility Investment" will be the subject of Harold H. Young, Eastman-Dillon and Co.

The final speaker at the third general session will be E. L. Lindseth, President of The Cleveland Electric Illuminating Co. Mr. Lindseth will address the conference on "What Community Modernization Means for the Electric Utility Industry."

The conference will conclude with a luncheon at noon on Thursday. Dr. W. H. Alexander, a nationally known speaker from Oklahoma City, Oklahoma, and an inspirational and enthusiastic leader, will be the guest speaker for the event.

Commercial-Industrial Joint Meeting

Harry Restofski, Vice President—Planning, West Penn Power Co., will preside at the Tuesday morning joint meeting of the Commercial Sales and Industrial Power and Heating Groups. He will introduce G. S. Young, Manager of Power and Lighting Sales, Kansas City Power & Light Co., and Chairman, EEI Industrial Power and Heating Group; and R. W. Butts, General Supervisor of Dealer Coordination, Ohio Edison Co., and Chairman, EEI Commercial Sales Group.

The first address at this joint session will be that of Dan Robertson, Jr., of the Illinois Bell Telephone Co. and Vice President of the Industrial Cafeteria Managers Association. Mr. Robertson will discuss the past, present, and future of industrial feeding with special emphasis on the vast potential of this segment of the food service industry, as well as the electric utility's place in this market.

In a speech entitled "Radio Isotopes in Food Preservation," W. E. Chamberlain, Projects Director for A.M.F. Atomics, Inc., will cover a timely topic, that of a full-scale, joint government-industry evaluation program on radiation processed food.

Harry Johns, Jr., Manager of the Electric League of Western Pennsylvania, will have as his topic "The Value of Cooperative Industry Promotion." He will discuss the need, reason for, and benefits derived from cooperative industry promotions, drawing on both local and national industry programs as illustrations.

The concluding speaker at the joint Commercial-Industrial Groups session will be William M. Shepherd, Vice President, Arkansas Power & Light Co. In his talk on "Sales Aids for Commercial-Industrial Markets," Mr. Shepherd will make a comprehensive presentation of techniques used in obtaining commercial and industrial power sales.

Residential-Farm Joint Meeting

The other joint session, that of the Residential and Farm Groups which will be held on Tuesday afternoon, will be presided over jointly by Hugh H. Brenan, Manager of the Residential Sales Department, Pennsylvania Power & Light Co., and Chairman of the EEI Residential Group, and Bud S. Moss, Manager of the Rural Division, Georgia Power Co., and Chairman of the EEI Farm Group.

G. F. DeFoe, General Sales Supervisor, The Washington Water Power Co., will open this meeting with a presentation entitled "Selling Faster With Pictures." C. F. Kreiser, General Sales Manager, Edwin L. Wiegand Co., will address the group on "Electric Heating—It's Getting Hotter," and J. C. Cahill, Supervisor of Rural Sales, The Detroit Edison Co., will deliver an address entitled "The Sales Approach to Improved Wiring."

The final speaker at this session will be George W. Campbell, Geneva, Ohio, who will have as his topic "Out of the Shadows."

Farm Group

At its individual meeting on Tuesday morning, the Farm Group session will be presided over by M. O. Whithed, Farm Sales Supervisor, Atlantic City Electric Co.

B. S. Moss, Chairman of the Farm Group, will make opening remarks prior to the first speech at the meeting, which will be entitled "Farm Sales — The Utilities' Opportunity," delivered by Carl T. Bremicker, Vice President, Northern States Power Co.

C. A. Hanson, Director of the Barn Cleaner, Cattle Feeder, Silo Unloader Association, has chosen "Selling Electric Equipment" as the topic of his presentation before the group.

The Editorial Director of *Electricity on the Farm*, W. J. Ridout, Jr., will have "Farm Equipment Must Sell" as the subject of his address.

At the Farm Luncheon, to be held at noon on Tuesday in the Michigan Room, Herbert Pike, a Whiting, Iowa, farmer who participated in the recent program of exchange between the United States and Russia of farmers for inspection tours, will be the featured speaker. Mr. Pike will have as his subject "Farming in Soviet Russia."

Commercial Sales Group

The Commercial Sales Group will have its individual meeting on Tuesday afternoon. At that time, R. W. Butts, Chairman of the group, will preside. Following his opening remarks, a series of 10-minute presentations which describe "Lighting

Sales Programs That Click" will be made.

The first of these presentations, to be made by John G. Snyder, Director of Domestic-Commercial Sales, American Gas and Electric Service Corp., will describe "Operation Main Street." This small town area development program is designed to be given to merchant groups by local utility sales personnel to stimulate interest in remodeling, including lighting, air conditioning, store fronts, etc.

"The NEMA Program for Action" will be concerned with Rhode Island's Certified Lighting Program, which was begun in September, 1954. William N. Freudigman, Assistant Merchandise Sales Manager, The Narragansett Electric Co., will review the program's 18-month record and will discuss training courses and promotion techniques as well as future plans to re-implement the program in three years.

William L. Byrne, Ebasco Services Inc., will make the concluding presentation in the "Lighting Sales Programs That Click" series. In his discussion of "The Value of Commercial Lighting Loads to Utilities," Mr. Byrne will establish, by showing some successful programs, a guidepost for evaluation in answering the questions "Are you providing the aggressive leadership and promotion effort to sell good lighting to the mass market?" and "Can you afford to do more?"

The series of presentations will be followed by an address by Milton Maidenburg, Chairman of Food Service Equipment Industry, and Treasurer, National China and Equipment Corp. Mr. Maidenburg will have as his subject "Commercial Cooking Equipment Dealers and their Reaction to Electric Utilities."

Lowell R. Mast, Director of Engineering, Electromode Division, Commercial Controls Corp., also will address this session and will have as his topic "Electric Space Heating Going Places." Mr. Mast will review the recent increase in acceptance of electric space heating and some of the past developments that brought this about. He will discuss outstanding and unusual installations in which his company played a leading developmental role. The examples will include an electrically heated factory in Cleveland, Ohio, and an electrically heated school in Indiana. Mr. Mast also will give his evaluation of future possibilities for application of both supplemental and total space heating, and will point out how manufacturers and utilities can work together to achieve best results for the customer, utility, and equipment manufacturer.

There will be one additional speaker, as yet unnamed, at this session.

Presiding over the individual meeting of the Industrial Power and Heating Group, also to be held on Tuesday afternoon, will be Howard W. Memmott, Industrial Sales Manager, The Connecticut Light & Power Co. The meeting will open with a report by the group chairman, Glenn S. Young.

Topics and speakers for this session include the following:

"Resistance Heaters—the Midgets with Giant Appetites," by W. L. Thomson, Manager, Radiant Heating Division, Edwin L. Wiegand Co.; "The Development and Use of Promotional Sales Tools," by J. F. Morton, Industrial Sales Manager, New Orleans Public Service Inc., and B. J. Martin, Publisher, *Electrified Industry;* and "Our Competition Is Not Asleep," by Roy W. Wages, Field Supervisor, Industrial Sales Engineering Division, Georgia Power Co.

Chairman Hugh H. Brenan will make opening remarks at the individual session of the Residential Group on Tuesday morning when G. L. Lahodny, Vice President, The Detroit Edison Co., and Chairman of the EEI Market Research Committee, will preside.

The Dealer Coordination Committee will make a panel presentation entitled "EAR—Your Best Friends." The Operation Home Improvement program will be described to the group by John R. Doscher, OHI Executive Director, whose subject will be " '56 . . . the Year to Fix—What It Means to You."

Another feature of this session will be a show presented by the Residential Lighting Committee. This program, "New Fashions in Living and Lighting," will have Miss Gladys Miller as commentator on decorations, James H. Jensen as commentator on lighting, and an as yet unannounced commentator for fashions. Martin Klein will edit the script.

The session will conclude with a discussion of "Distributors Like EEI Promotional Programs" by W. B. Frogue, Branch Manager of the General Electric Appliance Co. in St. Louis, Mo., and R. P. Gubbins, Branch manager of the Hotpoint Appliance Sales Co. in Buffalo, N. Y. Other regional distributors are anticipated as additions to this discussion.

Landscaping Beautification Award Won by Rochester Gas and Electric Corp.

THE ROCHESTER GAS AND ELECTRIC CORP. has been recognized by the American Association of Nurserymen as one of the national winners in its Industrial Landscaping Contest.

The award was presented at the Eastern Regional Convention of the American Nurserymen Association at the Roosevelt Hotel in New York City at a luncheon on January 5, 1956. It was received on behalf of the company by Lynn J. Cooley, Superintendent of Electric Generation.

Three years ago, the American Landscaping Association instituted these awards in order to encourage and stimulate more interest in the landscaping and beautification of industrial and other buildings. Awards are given on both a national and regional basis. The Rochester Gas and Electric Corporation received the national award and was the only utility company this year to be so honored. The prize was given as a result of a presentation of the original plan for landscaping the company's newest electric generating station located on the shores of Lake Ontario, Russell Station. Photographs of various views of the trees and shrubs surrounding the station were also included as part of the winning entry.

The building of this newest addition to the Rochester company's electric generating system started in 1946 on the site of an old orchard beside a swamp on the shores of Ontario, and is now surrounded by many new homes built since its completion. Three electric steam turbo generating units have been completed, while the fourth and last is in the process of construction. The station will have a capability of over 270,000 kw when completed.

Cost Reduction Theme for 1956 EEI-AGA Accounting Conference

PLANS for the program of the 1956 National Conference of Electric and Gas Utility Accountants sponsored by the EEI Accounting Division and AGA Accounting Section, to be held on April 16, 17 and 18, 1956, at the Hotel Commodore in New York City, are generally firmed following a joint final 1956 Conference Working Committee meeting held in Pittsburgh on February 2 and 3.

The meeting will be headed by John C. Faris, Union Electric Co. of Missouri, Chairman of the EEI Accounting Division, and Edward R. Eberle, Public Service Electric and Gas Co., Chairman of the AGA Accounting Section. Mr. Faris stressed that the April meeting will be a conference and not a convention, would highlight, as its basic theme, the subject of cost reduction.

The conference will follow the general pattern of previous years with a general session on Monday, April 16, starting at 2 p.m. and with standing committee sessions on Tuesday and Wednesday, April 17 and 18. The General Activities Group will conduct a joint session on Tuesday morning and the Customer Activities Group will hold a joint session on Wednesday morning.

General Session

Consolidated Edison Co. of New York, Inc., which will act as host company to the conference, will be represented on the Monday general session with a welcome to the group by Harland C. Forbes, President of the company. Following greetings by the respective representatives of both associations, the conference, which is expected to attract approximately 1200 registrants, will hear in the general session addresses by Emmett J. Leahy, President and Executive Director, National Records Management Council, on the monetary savings through filing; by the Hon. H. Lester Hooker, a member of the Virginia State Corporation Commission, on "Regulation Is a Living Thing"; and by Arthur H. Motley, President,

J. C. FARIS
Chairman of the Accounting Division Executive Committee

"Parade Publications," New York, and past national President Sales Executive Association, on the American system of free enterprise.

Customer Activities

The Wednesday morning Customer Activities Group session will have a panel consisting of five members of various companies presenting the subject of planning for installing and operating a mechanical drum 650 calculator, a discussion of the standardization of credit policies in opening new accounts, and a customer education program on promoting caution near utility facilities, represented by an actual demonstration with excellent exhibit material of a member company.

General Activities

Highlighting the Tuesday morning General Activities Group session will be a panel discussion on the timely subject of accelerated depreciation. Representatives of four of the general activities standing committees will participate on the panel. This session will also hear discussions of an application of 705 electronic computor to payroll accounting and the auditing of electronic processed work.

In addition to the group sessions referred to above, the several standing committees in the Accounting Division will conduct individual committee sessions jointly with corresponding AGA committees, generally two half-day sessions in each case. Some of the topics and subjects to be covered in this program include: procedures in connection with a service order, advantages of various periodic methods of meter readings and billings, standardization of cost comparison, bill payment agency practices, methods of notifying customers of billing changes, and a visual review of customer interview facilities. Collection problems will include a discussion of the selection and training of personnel for credit and collection work, a look at today's collection practices, timing of collection appeals, and the adaptation of collection work to electronics.

With a general subject of "Human Factors in Accounting Costs," the accounting Employee Relations Group will discuss this theme around such topics as the question of overdoing employee indoctrination, employee security, and supervisory control.

General Accounting Subjects

Other general accounting subjects to be presented in various committee sessions include the advantages and disadvantages of segregation of depreciation reserves either as a memorandum account or book account by primary accounts rather than group accounts; practical application in depreciation accounting; accurate activity accounting—developing criteria for measuring performance in utility companies and in various operations concerned; and cash flow reports to top management. Additional topics to be included are controlling costs through responsibility reporting; experience in setting up order program electronic accounting procedures; auditing in connection with credit and collection; acquainting operating personnel with plant accounting, utility plant records for management as they affect property records; and appropriate and timely subjects on taxation accounting.

(Continued on page 64)

Utility Public Relations Practices

By Dan E. Karn
President, Consumers Power Company

SOMEONE has said that public relations is the art of treating the public as if they were not your relations.

The truth is that the best way to assure good public relations is to deserve them. Character comes first in a public service company just as it does in an individual. Public relations techniques miss their mark unless the company's basic attitude toward its customers is fair and friendly, as is the case with practically all utility companies with which I am familiar. But a man of fine character and instincts may be unpopular and lonely unless he has learned how to win favorable attention. This is true of a utility company, too.

The purpose of these paragraphs is to review certain public relations practices which have given results in the case of Consumers Power Co. They were not originated by us, nor do we claim to be their most accomplished practitioners, but they have helped us.

Widespread Territory

Ours is a rather large electric and natural gas company in a definitely non-metropolitan area. Sometimes we say it is the largest company serving a territory which includes no metropolitan city, but this may be unfair to Grand Rapids and Flint, each with a population approaching 200,000. Anyway, we supply electric service to 765,000 customers and natural gas service to 400,000, and the overlapping electric and gas service areas contain a population of about 3,420,000.

The combined service area embraces 28,500 square miles of urban, farming, and recreational country in 64 Michigan counties. It stretches from the Ohio and Indiana borders to the Straits of Mackinac and from Lake Michigan to Lake Huron. We serve a total of 1,584 cities, villages, and townships, many of which are more than a hundred miles from our general offices in Jackson (a city of 52,000), and some of which are as much as 275 miles distant.

Only 29 of the cities served have populations exceeding 15,000. More than 100,000 of our customers are farmers, and I do mean *farmers*, not just rural customers. On the other hand, thousands of our natural gas customers work in Detroit, a city in which we do not operate, and return at nightfall to one of the "bedroom" towns where we supply service.

Obviously, the job of maintaining proper public relations in this vast and diversified territory is somewhat different than it would be if the great majority of our customers were residents of a single metropolitan area, though perhaps not more difficult. We cannot be good citizens of just one community. Like our friends of Georgia Power, we must (in the words of that company's well-known slogan) be "a good citizen wherever we serve." The responsibility of good citizenship cannot be assumed for the whole operating area by any small group of men in any single city; it must be delegated to many men and women in hundreds of communities. We cannot talk to our customers through the newspapers of any one metropolis; there are some 30 dailies and 350 weekly newspapers in our service area.

Decentralized Operation

Our plan of handling public relations under these rather unusual but certainly not unique circumstances is twofold:

1. Administrative responsibility is genuinely decentralized.

2. Company officers and general office personnel carry on a regular program of public relations activities throughout the service area.

The territory in which we operate is apportioned among twelve operating divisions with headquarters in Alma, Battle Creek, Bay City, Flint, Grand Rapids, Jackson, Kalamazoo, Lansing, Muskegon, Pontiac, Saginaw, and Traverse City. In his own area, the division manager is Mr. Consumers Power, but he may have several district or local managers under him, each of whom, in his own smaller sphere, is Mr. Consumers Power too.

Of course, the division manager has full charge of everything in his division, within the limits of policies and procedures established by top management in Jackson, but unless he is a good public relations man he is not a good division manager. He has superintendents who, under his direction, handle such matters as accounting and electric or gas distribution, but public relations is his own primary responsibility.

It is the division manager who keeps in touch with governmental officials, represents the company in civic activities, cooperates with newspapers and other communication media, visits with major users of electricity and natural gas, and, in general, sees to it that the company does a good job and enjoys the respect of the people it serves. He has an assistant to handle some of the details, but the responsibility rests squarely on himself.

Top management intrudes no more than necessary. Questions arising in any division are handled in that division, not in the general office. If there is a public statement to be made—outlining the year's construction program in the division, for instance—the division manager makes it. A press release that another company might issue in a single form, quoting a top officer, is often issued in 12 versions, one for each division, quoting the division manager.

So, too, with the district and local managers. They speak for the company within their own areas of responsibility. We think a published statement has greater impact and better acceptance when a large percentage of the customers are acquainted personally with the man who is talking.

Employees Win Friends

The employee organization is a powerful force in public relations. We have something more than 10,000 employees, or roughly one per 100 cus-

Reprinted from January 19, 1956, issue of Public Utilities Fortnightly.

tomers. Every employee is indoctrinated to understand that in his (or her) dealings with customers, *he* is Consumers Power Co.

For employees whose jobs involve numerous contacts with customers, there are training courses which emphasize courtesy and proper consideration for the other person's viewpoint. Telephone operators, cashiers, complaint clerks, are among those who receive this training. Everyone who drives a Consumers Power Co. motor vehicle is taught to drive safely and with courtesy. This pays off in dollars and cents as well as in good public relations. Employees are encouraged to participate in Community Chest campaigns and similar activities. They are recognized for good citizenship, and this contributes to the company's good standing in the community. A number of our people are officers or members of boards of education in their communities. Meeting with other civic-minded citizens on common ground to consider school problems, they arrive at a mutual understanding that makes for good public relations.

Continuity of Employment

Continuity of employment makes utility company men and women especially good citizens. They usually are home owners. They like their occupation, and they plan to remain in town. They want to make it a better town for themselves and their children. Long service also makes them better employees. We try to keep our employees with us for many years by making their jobs attractive and by providing for retirement on pension at age 65 or earlier. Long service is recognized through the presentation of service pins at annual service pin dinners attended by wives and husbands as well as the employees themselves.

An employee who likes the company and who has chosen to spend his working years in its service is usually an influence for good public relations. He knows his job and does it well, which pleases the customers. He also "sells" the company to his friends and neighbors. This is especially true if he happens to be a stockholder as well as an employee—as some 25 per cent of Consumers people are. On several occasions during the last five years, we have made it possible for Consumers' employees to buy up to 100 shares of common stock at a favorable price by means of payroll deductions. I know of no better way to promote employee understanding of how a company operates, nor to cause an employee to identify his own interests with those of his employer.

"Enjoy Our Land"

I mentioned that the company carries on a number of public relations activities from the general office. Some of these grow out of the characteristics of outstate Michigan.

The Michigan "mitten," more formally known as the lower peninsula, is one of America's great recreational areas. Lying between Lake Michigan and Lake Huron, dotted with smaller lakes and traversed by famous trout streams, it attracts millions of tourists every year. Although 90 per cent of the power distributed by Consumers is generated in a few large thermal plants, the company has 38 hydroelectric plants on Michigan rivers. The Au Sable, the Manistee, and the Muskegon are the principal rivers from the power generation viewpoint, and they are also the three most popular fishing rivers in Michigan.

Consumers owns many miles of forest lands along these streams. We must own them in order to maintain satisfactory flowage conditions. If we fenced the land and erected "Keep Off" signs, unfavorable public relations would almost certainly follow. But we don't. In effect, the company says to the public, "Our land is yours to enjoy." Fishermen, hunters, picnickers are allowed to use our river lands almost as if the dams were not there. Restricted areas are found only where considerations of safety or national defense make restriction necessary.

On the beautiful pond above the Foote Dam on the Au Sable river, the company has established Old Orchard Park for the use of trailer vacationists. Old Orchard has 80 campsites on 50 forested acres, with facilities for campfire cooking. Toilet accommodations are provided. At the caretaker's lodge and store, staple groceries, ice, and supplies may be purchased, and boats are available for renting. The camp is full throughout the summer season.

Red Bridge Camp on the Manistee river near Tippy Dam in similar. Like Old Orchard, it is operated by the company wholly as a public service. Profits derived from boat rentals or sale of merchandise help to compensate the caretaker for his efforts.

Several choice locations on the rivers have been leased at $1 a year to county governments or sportsmen's clubs for public use.

A number of camp sites along the rivers have been turned over to the state conservation department to be administered for the convenience of fishermen and canoeists. Permits for the operation of boat liveries on company land have been granted where liveries seemed to be needed.

The company helps keep northern Michigan attractive to tourists and sportsmen by reforesting its river lands and protecting them from forest fires. Reforestation work is carried on every spring and fall.

By the end of 1955 approximately 15,000,000 trees will have been planted by the company on some 16,000 acres. We are also maintaining natural forest cover on about 75,000 additional acres.

Sportsmen sometimes pause to wonder what would have happened if the Consumers lands along the Au Sable, the Manistee, and the Muskegon had been acquired in small pieces by many private holders. Their conclusion is that the rivers might have been much less usable by the public than they are under the Consumers plan of permitting free public access. A situation that might easily have promoted bad public relations actually contributes to *good* public relations.

Working with the Farmer

To serve more than 100,000 Michigan farms is a privilege our company values highly. These farms, naturally enough, are spread over a vast area and they include about every kind and size of farm that can be imagined.

Extending service to that many farms, a job largely accomplished in the last 25 years, involved economic problems that need not be dwelt upon. Then came the development period which still continues and will continue indefinitely. Farm use of electricity had to be built up to the point where both the farmer and the company would receive something approaching a proper return on in-

vestment. At the same time, good public relations with the farmers had to be established and maintained.

No one could sit in the general office in Jackson, Mich., and visualize the electrification problems of more than 100,000 farmers. We have a working farmer on our board of directors, which helps, and we have a general farm service supervisor, with an assistant, in the general office.

But we also have 22 farm advisers distributed among our 12 operating divisions.

Keeping in Touch

These men have no equipment to sell. Their job is to keep in touch with the farmers and farm agencies in their own areas and to give advice on electrification matters as requested. They are men who know both farming and electricity, and they have popularized many electrical applications which mean better profits for the farmer and increased load for Consumers Power Co. Working with Michigan State University, county farm agents, 4-H clubs, and other agencies, they have helped Michigan farmers to develop ways of using electric heat in the brooding of chickens and pigs, to drain muck lands with electric pumps, to transfer and grind grain with electric power, and to illuminate the underside of a milk cow with electric lighting built into the floor.

If the agricultural high school or the 4-H club needs a speaker or a motion picture (with machine and operator), the program chairman knows he need only call the nearest Consumers' office. If a farmer wants to do something with electricity but cannot quite figure out how to do it, expert counsel is available.

That activities of this sort mean good public relations in the farm areas was illustrated recently when Michigan State University presented an official citation to the company's general farm service supervisor in recognition of his outstanding contributions to Michigan agriculture.

State-Wide Viewpoint

Although company operations are decentralized among the 12 divisions, there is no dodging the fact that the company's officers are located in Jackson and not in any other division headquarters cities, several of which are larger than Jackson. Consumers' officers know they must always think in terms of the whole service area and never let their vision be restricted by the boundaries of a single city. To preserve their state-wide viewpoint, they travel among the divisions frequently, and this is true of the directors, also.

Our directors include men from Grand Rapids, Flint, Saginaw, and Kalamazoo, as well as Jackson. Monthly meetings of directors are held. Normally, these are in Jackson, but often they are in Grand Rapids, Flint, Bay City, Muskegon, Pontiac, or somewhere else, and it is customary to have luncheon or dinner with a group of local people for the discussion of business and public relations problems. Often these meetings of the board coincide with an open-house program at a power plant or a new service building. Such occasions offer particularly good opportunities for our directors and officers to keep in tune with the people in the larger communities we serve.

Open Houses

It probably is unnecessary to add that we hold open house whenever we have a good excuse to do so. Some of our more recent open houses were at the new Flint Service Center, the new Central Division Service Center in Alma, and the new General Meter building in Jackson. Public response to open-house invitations has been more than gratifying. In Flint, for instance, we entertained some 20,000 visitors in a period of a few days, and every person, I think, left our property with a new appreciation of the electric and natural gas service industries.

Another recurring public relations project that has paid rich returns is our annual series of regional stockholder meetings. Consumers is incorporated under the laws of Maine and our annual meeting is held in Portland. This is not a convenient meeting for our Michigan customers to attend. Some years ago our chairman of the board, Justin R. Whiting, instituted the plan of holding regional stockholder meetings in some of the principal cities of the service area immediately after the Portland meeting. Stockholders turned out in large numbers.

Now we hold ten regional stockholder meetings in April of every year —in Battle Creek, Bay City, Flint, Grand Rapids, Jackson, Kalamazoo, Lansing, Muskegon, Saginaw, and either Pontiac or some other location in our southeast division.

Consumers has about 71,500 stockholders, common and preferred, of whom about half live in our service area and thus are customers as well as stockholders. A total of about 4,000 attend the ten regional meetings. This is a fair percentage and it should be remembered that the 4,000 who attended this year are not necessarily the same 4,000 who attended last year.

The important thing, however, is that every stockholder in or near the ten cities has an opportunity to attend. If he passes up the meeting, he still remembers that he received an invitation.

Press coverage of the regional meetings is encouraged, and sometimes the newspaper sends a photographer as well as a reporter. When newspaper readers come across the account of the meeting, they are reminded that Consumers Power Co. is no remote abstraction but a Michigan company in which many thousands of Michigan people have invested a portion of their savings.

Area Development

For several years, Consumers has been carrying on a national advertising program emphasizing outstate Michigan's advantages as an industrial location. Other utility companies have similar programs and I shall not go into details about ours. Our industrial site advertisements appear in *Newsweek*, *U. S. News & World Report*, and various other publications, and the point I want to make is that our customers are pleased when they run across one of these ads. They are proud of Michigan and happy to know that Consumers Power Co. is buying space in national publications to tell the people of America about our state. To be sure, the main purpose of our industrial site advertising program is to attract manufacturers, but it pays off in better public relations also.

This is even more true of the work of our industrial development director and his assistants. Much of their work is in small communities, espe-

(*Continued on page* 63)

Hells Canyon—Politics or Power?

By A. C. Inman

Vice-President and General Counsel, Idaho Power Company

An Address before the PIP Workshop Conference and the Ebasco Utility Executives Meeting, New York, N. Y., December 5, 1955

I WOULD belabor the obvious, to state that further socialization of electric power will be a major political issue in 1956. Public power is a hardy biennial that appears every two years in the lush and sometimes rank garden of American politics; and, once again, the electric industry will become the political whipping-boy, not only of run-of-the-mill socialists and left-wingers, but also of many good, plain American politicians who hope to obtain votes by berating this particular segment of American Industry.

And I need not tell you, either, that the politics of public power is no longer a local problem that involves one or two companies that happen to be under fire at any given place or time—as at Niagara, as with us at Hells Canyon, as it was at Roanoke Rapids, and as it is at Pleasant Valley and Mountain Sheep out in the Northwest.

If anything has brought that fact home, it is the House Committee hearings during the past year—the so-called Jones Committee on the Power and Resources section of the Hoover Report, carefully staging its performances all across the country—and, of course, the Chudoff Committee—that opened in Washington, and then took the show on the road, ranging far and wide, over the Southeast, the Southwest, the Missouri Basin, the Pacific Northwest, and California. The political nature of this so-called investigation has become so apparent that newspapers have called the hearings "farcical," a "sorry performance," "political skullduggery that approaches a new low," "windy blasts and uproar which ignore the factual story."

It is all part of the campaign for more political power, through more public power; to put the Federal government directly into the power business, and to have Uncle Sam assume "public utility responsibility" for supplying the power needs, especially, of the so-called "public bodies" which constitute the favored "preference" group. And, with the taxpayers footing the bill.

Unfortunately, the power question, in politics, is seldom presented on the basis of facts, full disclosure, or economic evaluation. Rather, it is launched on waves of oratory and dialectics, larded with name-calling and appeals to class prejudice, anything in fact to avoid the real fact that the public power movement, if deprived of its Federal cost subsidy, its avoidance of taxation, and of the so-called "preference clause"—if deprived of these things, public power would no longer be a political issue. The avoidance of taxes and the preference clause are the two crutches, without which many of the so-called "public bodies," organized to distribute government power, could not stand on their own feet. Theirs is the familiar "philosophy of the free ride" —of getting something that you haven't paid for, and haven't earned.

Aptly Named

I want to tell you about Hells Canyon—aptly named to catch the eye and to hold the ear for one of the biggest political and propaganda campaigns ever waged against the electric industry in general and one single company in particular.

On August 4, 1955, the Federal Power Commission, by the unanimous decision of its five members, issued a license to Idaho Power Co. to build three dams in Snake River, where it forms the state boundary between Idaho and Oregon. Petition for rehearing was denied September 29.

On November 3, following prior approval by the U. S. Army Engineers, the Commission approved the general plans for the principal structures of both the Brownlee and Oxbow projects. And on November 28, 1955, our opponents in the case, all of them public power advocates of a government dam at Hells Canyon—with their usual fanfare of publicity, as was to be expected—have appealed the Federal Power Commission's decision to the courts.

As we go along I shall endeavor to outline some of "the sound and the fury" they have let loose since the Commission's decision was announced four months ago.

The Commission was "rigged," "packed," "prejudiced," they say, and the decision purely political. Conveniently overlooked, of course, is the fact that, by law, the Commission is a bipartisan body, and can have no more than three members from the same political party. Actually, of the five, two are Democrats, two Republicans, and one an Independent without regular party affiliation. The Commissioners are assisted by a large staff of engineers, counsel, and other technical experts, many of whom are civil service employes. They are the body, created by Congress itself, to decide the complicated questions upon which comprehensive river development depends.

In its decision, the Commission pointed out that under the Federal Power Act, "it is charged with the duty of determining what is the *best* plan of development," because the Act requires that licenses be issued only for projects which are best adapted to a comprehensive plan for developing the waterway, not only for power purposes, but for flood control, navigation, and other public uses.

You have heard a great deal about the "low dams" that Idaho Power Co. is going to build.

In the first place, I should like to point out that the Commission's decision made it clear that the company's project will develop the full 602 feet of head in the Hells Canyon reach of the river, to the same extent as would the single government dam.

And as to the size of these dams of ours, the decision also makes that clear, which should quiet, once and for all, the public power propaganda that the company's projects will be "low dams." Oxbow Dam, smallest of the three, will be 205 feet high, double the height of the famous Bonneville Dam on the Columbia, and some 30 feet higher than Niagara Falls. The company's Hells Canyon Dam, 320 feet high, will be nearly twice the height of Niagara Falls. And Brownlee Dam, biggest of all, will be 395 feet high—107 feet higher than the Capitol dome in Washington, D. C., and among the 15 largest dams in the United States.

What about costs?

The company estimates the cost of its three dams at $133,000,000, and this figure was supported before the Commission by the independent estimate of Morrison-Knudsen Co., a world renowned firm of contractors, engineers, and builders.

Proof of the Pudding

There is an old saying that "the proof of the pudding is in the eating." Well, then—on November 9, the company entered into a contract with Morrison-Knudsen for the construction of both Brownlee and Oxbow, the first two units of the development. Construction of Brownlee is well under way. The generators and major electrical equipment are on order and, together with the construction contract, give added assurance that the projects will be built well within the cost estimates which we submitted to the Commission.

On the other hand, the official estimate for the proposed government dam, as presented to the Federal Power Commission in sworn testimony by government witnesses, is $356,800,000, without interest during construction. Adding interest, and bringing the estimate up to current price levels, Federal Power Commission engineers estimated that the actual cost of the government dam would be $399,000,000.

Therefore, the comparison is this: for the company's dams, $133,000,000; for the proposed government dam, $399,000,000—exactly three times as much.

Now, what about power output?

In the Federal Power Commission hearings, three studies were presented of average annual energy generation at the so-called "high" dam—two by government witnesses, and one by Idaho Power. In comparison with the energy output of the company's three dams, and taking the largest and most favorable estimate for the government dam, the difference is less than 5 per cent. And using the average of the three estimates for the single dam, the difference in output is less than ¾ of 1 per cent. In other words, three times—or 300 per cent—of the amount of the investment, to obtain a doubtful advantage of from 5 per cent down to ¾ of 1 per cent in average annual generation.

The Federal Power Commission staff made its own studies to determine the actual dependable capacity of the comparative programs of the single government dam versus the company's three-dam program. Based upon this evidence, submitted by its own engineers, the Commission found that the dependable capacity provided by the company's dams will be 767,000 kilowatts, as compared with only 785,000 for the proposed government dam—a difference of only 18,000 kw, or about 2 per cent, in spite of the additional quarter of a billion dollars (over and above the cost of the company's development) that the government dam would cost.

And now we come to one of the high lights of the campaign of misrepresentation that is being waged by public power advocates of the government dam, and the type of propaganda that is being used.

By means of written articles, speeches, radio broadcasts, "letters to the editor," and every other channel that they can devise, proponents of the government dam are literally flooding the country with erroneous figures pretending to compare the power production from the two plans of development.

The current misquotation, which no doubt you have read, is 505,000 kw for the company's dams, as against 924,000 kw for the government dam.

You will recall that the Commission found that the dependable capacity for the company's dams will be 767,000 kw, as compared with only 785,000 kw for the proposed government dam. What, then, is this 924,000-kw figure, which they attribute to the government dam, which is 124,000 kw more than its total proposed installed capacity? The answer is that these two figures—505,000 and 924,000—relate to entirely different things, which are not even comparable; and don't think for a minute that the parties who have been the source of this misinformation don't know it! Because it is plain and clear in the record.

In the first place, the 505,000-kw figure for the company's dams is an estimate of "at-site" power production only, as compared with "at-site plus downstream" production for the government dam. And the "downstream" production attributed to the government dam included assumed generation from eight other power dams farther down the river, five of which are not in existence, and may not even be built in the foreseeable future.

But that is not all. The 505,000 figure for the company dams is an estimate of power production in a low water year, when stream flow conditions are at their worst. The 924,000 figure for the government dam was based upon so-called "nominal prime output," a theoretical figure higher than actual power production even in wet years of highest stream flow.

Fair, Equal Comparison

If a fair or equal comparison had been wanted, or in fact intended, the figure which corresponds with the 505,000 kw for the company dams, as the record clearly shows, is 513,000 kw for the government dam, a difference of only 8,000 kw. And if a comparison of at-site *plus* downstream power production were wanted, under the same water conditions, the comparative figures are also plain in the record—525,000 kw for the company dams, and 587,000 kw for the government dam, assuming all of the non-existent downstream plants, at a cost of another half a billion dollars, are eventually built.

To summarize this purported comparison made by our public power opponents: for the company's project at-site production only, in a low water year; for the government dam—at-site plus downstream production, in a high water year.

I regret if this has seemed complicated. It is a necessary exposé of the unfair and invalid arguments with which the opponents of private enterprise development are attempting to

confuse and mislead the public. And certainly it is no more complicated than the devious methods they are using in their frantic attempt to disparage the Federal Power Commission's finding that the company's three-dam program is the one that is "best adapted to a comprehensive plan" for developing the river.

As to power costs, advocates of the government dam again do not refer to the record, but to a computation made by the examiner, by which he arrived at 6.6 mills per kilowatt-hour as the cost of power from the company's development. This high figure was based not only upon the 505,000-kw minimum water output which I have just described, along with an estimate of $191,000,000 for the construction cost of our projects, but also upon operating costs "chosen" by the examiner which, as he himself admitted, exceed those of the company, based upon actual operating experience, "by about 370 per cent!"

The examiner frankly stated that in making his computations, he selected estimates which "would provide the greatest margin for error," which is only another way of saying that he "chose" figures which would probably turn out to be as wrong as possible.

In other words, in order to be conservative, he viewed the company's three-dam program in the worst possible light, in terms of power output, construction cost, and cost of operation after it is built. Nevertheless, he found that it was best adapted to a comprehensive plan of development, and recommended that the Brownlee Dam be licensed for immediate construction. And that, of course, made our opponents mad.

I have mentioned before the charges made by these public power groups (because the Commission's decision was against them) that the Commission was rigged and stacked. These folks have had an interesting change of heart about the examiner. Since the Commission's decision to license all three dams as a single project, they are hanging on to the examiner's power cost computation as a drowning man clutches at a straw. But what did they think about him before? They told him in no uncertain terms. In their exceptions filed to his decision, they called his predictions "irresponsible guess work." They accused him of "political divinations," based upon "dubious assumptions" and "tealeaf prognosis." He adopted a "truncated version" of the law, they said, and his analysis of the Federal Power Act was "a diametric perversion."

But to come back to the examiner's cost of power, and the methods by which it was arrived at. The Commission properly ignored his "greatest margin for error" theory as a basis for fact finding. Instead, it determined the value of power at market, and the cost of getting it there. It based its finding of project feasibility, as it has done in many past licensing decisions, upon the excess of the market value of the power that the company's three dams will produce over the cost of producing it.

In arriving at its decision, the Commission did not use the company's $133,000,000 construction cost estimate. Instead, it used a much higher estimate prepared by its own staff, in the amount of $175,000,000. But the Commission was fair to point out that the company's estimates were 28 per cent lower than those of the staff, and that if the three dams can be constructed for less than the staff estimate—and we have reason to know that they will be—then, as the Commission said, the economic feasibility of the company's project would be even greater.

Commission Finding

The Commission found that on an equal basis of comparison, the ratio of power benefits to power costs for the company's plan was greater than for the proposed government dam; and that from a power standpoint the single dam, in spite of its great cost, had "no clear economic advantage" over Idaho Power's Program.

The Commission firmly stated its finding that, "It is our judgment that the United States itself should not undertake the development of the water resources of the Hells Canyon reach of the Snake River."

After disposing of the power questions involved, the Commission considered in turn, flood control, navigation, fish and wildlife, recreation, and other economic aspects of the alternate plans for development. Of all of these issues, it found that Idaho Power's program measured up to the standards of the Federal Power Act for full and comprehensive development of the waterway.

The Commission pointed out that of the 2,300,000 acre-feet of flood control storage that is contemplated on the middle and upper Snake River, the company's program will provide at least a million acre-feet of this storage without cost to the United States and that it is consistent with the Army's flood control plans. The remaining storage is readly obtainable at other sites on the river, where it will serve not only flood control purposes, but irrigation needs as well.

In summing up its decision, the Commission found that the company's three-dam program is best adapted to a comprehensive plan of development, and that it will provide these things:

1. 1,000,000 acre-feet of flood control storage.
2. Stream flow regulation in aid of navigation.
3. Reasonably prompt development of water-power now going to waste.
4. A source of power supply for developing of phosphate resources.
5. And finally, that it will provide electric consumers in the service area of the company with the lowest cost power supply that it could develop.

And the Commission again pointed out that, to the extent that these things are done by a non-Federal entity, the public purposes involved will be realized without expense to the taxpayers or to the United States.

That brings up one further point that I will mention.

These three projects of the Idaho Power Co. will provide approximately $10 million annually in taxes to the Federal, state, and local governments —*4 million new tax dollars each year to the States of Idaho and Oregon,* and approximately *$6 million annually to the Federal government.* That is an added advantage of doing the job under the American taxpaying enterprise system.

Let's look at the alternative for a moment. Who, for example, are the parties that are leading the fight against private development? I'll tell you who they are. The American Public Power Association, the Northwest Public Power Association, the Na-

tional Hells Canyon Association, and eight Public Utility Districts in the State of Washington. Taxpayers?

Let's take a look at these eight PUDs. First of all, of course, they are "preference" customers for government power. How much taxes do they pay? What have they done for themselves to supply their own power needs before going to Uncle Sam with their hands out and before attempting to prevent other citizens, who are served by electric companies, from obtaining power supply which they also need?

Well, these eight PUDs report to the Federal Power Commission, and the statistics of their 1954 operations are now officially on file. Rather sizeable operations, all of them. Together, they serve over 75,000 customers, with a combined plant account of well over $33,000,000.

How much of this is production plant? Well, the answer to that is published, too. One of them has a small 496-kw generator carried on its books at about $40,000! All of the others have not a single dollar invested in production plant—not a single kilowatt of generating capacity that they have provided for themselves or their customers.

How much taxes do they pay? Less than 6 per cent of their total gross revenue, as compared with approximately 23 per cent for the electric industry as a whole, and 33 1/3 per cent of every dollar that it takes in, which is paid to the Government in taxes by Idaho Power Co., and which the public power crowd are so quick to point out must come from our customers.

No Economic Leg

That is why I say that these so-called "public bodies," organized solely for the purpose of buying and selling tax-free government power—if deprived of their power cost subsidy provided by U. S. taxpayers, if deprived of their own avoidance of taxation, if deprived of their unfair "preference" to obtain government power so that they need not provide their own—would not have an economic leg to stand on.

That's why, of course, they oppose private development, partnership development, or any power development, that will not continue to give them subsidized tax-free power, with a "preference" right to be first in line to get it.

That's why the manager of one of these eight PUDs, who is also a member of the Executive Committee of the National Hells Canyon Association, on which he represents the Northwest Public Power Association —(incidentally, how is that for a holding company with interlocking directorates!) — finally admitted in his testimony before the Federal Power Commission, that it was his theory that the building of further plants on the Columbia should be frozen until constructed by the Federal government, "particularly with regard to proposals of private companies."

That's why, with them, it's Federal power or nothing—because they live and move and have their being in "the philosophy of the free ride," with somebody else paying the bill.

That's why they fight any change in the discriminatory "preference clause" in present law, which denies to 80 per cent of the power users of the nation equal or even fair access to government power where it is available. "Me first!" is the slogan; "let the others—but not us—look out for themselves."

That's why they also oppose the partnership program. Even that would require them to put up some share of capital in the enterprise, to supply themselves with at least some measure of their own generating requirements. Why should they, as long as they can continue to get their power from the silver platter that up to now the taxpayers have handed to them?

I quote briefly from an article, appropriately titled "The Blockaders," which recently appeared in the *Industrial News Review*, published in Portland, Oregon. It says:

> "A new and highly descriptive phrase is appearing in the nomenclature of the power industry in the Pacific Northwest," says the Portland, Oregon, *Journal*. "It's 'the blockaders.' And it is being applied, quite properly, . . . to the small segment of the public power movement which either wants an all-Federal power program or nothing. . . . They want Federal power monopolies, and nothing but Federal power monopolies. *And, apparently, they are perfectly willing to bring about power shortages through their obstructionist tactics.*
>
> "This situation, of course, is not peculiar to the Pacific Northwest. It is the same everywhere else in the country where there are water resources of any importance—and also where there is any chance at all of persuading Congress to authorize socialized Federal fuel plants. If and when power from atomic energy becomes commercially feasible, they will no doubt pursue an identical course. *They are determined that the people, regardless of the people's wishes, shall have socialized power—or none at all.*"

What would such a program of national socialism for electric power, just in the Northwest alone, cost the taxpayers of the nation? Let me give you some figures.

During the past ten years, approximately 40 per cent of all of the hundreds of millions of dollars appropriated by Congress for hydroelectric development has been spent in only four states—Washington, Oregon, Idaho and Montana. This expenditure, in the Pacific Northwest alone, has averaged the tremendous sum of $150 million per year.

Joint Studies

What about the future? According to studies jointly made by all the power agencies—both public and private — serving the Northwest, they have determined and officially reported that it will require approximately $3,000,000,000 in the next ten years to provide an adequate power supply for this area. Now, that is an average of 300 million dollars a year!

No wonder that Clarence A. Davis, Undersecretary of the Interior, recently asked the pertinent question—how much longer are the people of the other 44 states going to keep pouring 40 per cent of their total Federal power appropriations into this one limited area?

Let's look at the figures in terms of Hells Canyon alone. I believe that at the present time there are 435 members in the House of Representatives — 435 Congressional districts that they come from and represent. With the required transmission investment, this one project — a government dam at Hells Canyon—would require a Federal appropriation averaging well over one million dollars from every single one of the Congressional districts in the entire United States that sends a representative to

Congress. Maybe our Congressional candidates would like to let their voters try that one on for size. I don't think they'll buy it because Hells Canyon is only a drop in the bucket, compared with the over-all government program that these public power "blockaders" want from the taxpayers.

Before I leave this matter of taxes and taxpayers I want to refer to another political "hue and cry" that is being raised against utilities, this time about accelerated tax depreciation—that the electric companies should be singled out and left out of the law that permits tax assistance to industry when new facilities are provided, to the extent that such facilities are essential to our national defense. "By all means," they say, "don't let the electric companies have the consideration shown to other industries, to obtain temporary tax assistance, even if they can qualify under the law, and even though the law is written and intended to apply to all industry alike." The American Public Power Association and the National Hells Canyon Association is in the forefront of this campaign, too.

Oh, how it disturbs these tax-exempt public power bodies, and their trade associations, to have utility companies get a relatively small, temporary benefit in the payment of Federal income taxes, in which they themselves cannot participate, for the simple reason that they do not pay, and have never paid, Federal income taxes!

Here again the campaign of half-truths and misrepresentation is shaping up. A few weeks ago one of the large regional newspapers of the country (incidentally, in the TVA area) editorially referred to the "large sums of the taxpayers' money . . .used to subsidize private power developments" and stated that "this vast sum in tax write-offs will never come to the U. S. Treasury." Such a statement is absolutely false! Under the law, every dollar of temporary tax savings obtained through accelerated depreciation over a five-year period will have to paid to the Treasury in higher taxes throughout all the remaining life of the facility.

Neither is it true, as these anti-utility people imply, that the amount of this so-called "subsidy" equals, or even approaches, the amount of the actual cost of the property. It is, and can only be, a small proportion of the total investment required. In the first place, only a given percentage of the investment is ordinarily subject to accelerated depreciation at all; and in the second place, the tax rate allows, at most, only 52 per cent of this fractional amount as a temporary saving, spread over a five-year period. The law is clear; it permits only a tax postponement, not a tax write-off, and all of it must be paid back later through higher taxes in all the years to come.

There is a very big difference, indeed, between being allowed to defer a small part of your Federal taxes, and not having to pay any Federal taxes at all. And it is to hide this telling comparison between tax-free public power agencies and tax-paying utility companies that the usual smoke-screen of propaganda and misinformation is being laid down to conceal the facts.

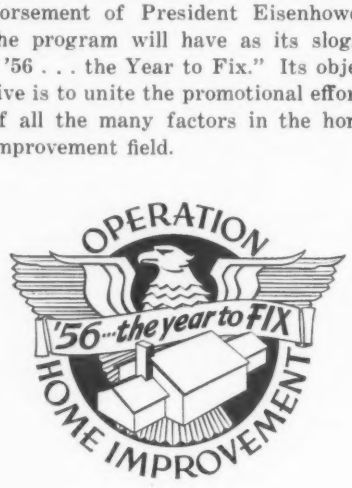
Have we told the public our side of the story? I am afraid I'll have to say that we have not. Never in my 30 years in this industry have I known us to be anywhere but on the defensive. We don't tell our story soon enough, or loud enough, or long enough. And all the time the other side is steadily boring away.

But we have a splendid opportunity—to stand up and say what we think, and what we believe—and above all, to give the people the facts to prove what we say. The truth and the facts about our industry, and our companies, can never hurt us. And we've got to tell the people of this country ourselves, because we know what to expect from the other side.

Operation Home Improvement Begins; 1956 Proclaimed Home Improvement Year

OPERATION Home Improvement, a year-long sales promotion campaign to combine all building, financing, and home equipment interests at the national and local level to sell more American families on better living in better homes, was begun on January 16, 1956, when U. S. Housing and Farm Finance Agency Administrator Albert M. Cole proclaimed 1956 as Home Improvement Year.

Initially sponsored by the U. S. Chamber of Commerce with the endorsement of President Eisenhower, the program will have as its slogan "'56 . . . the Year to Fix." Its objective is to unite the promotional efforts of all the many factors in the home improvement field.



F. Stuart Fitzpatrick, Manager of the Construction and Civic Development Department of the U. S. Chamber of Commerce, is chairman of the OHI Coordinating Committee. The treasurer is H. R. "Cotton" Northup, Executive Vice President of the National Retail Lumber Dealers Association, and John R. Doscher is executive director.

Among the contributing sponsors are the Chamber of Commerce, National Association of Home Builders, National Retail Lumber Dealers Association, National Electrical Contractors Association, National Gypsum, Masonite, Congoleum Nairn, Reynolds Metals, U. S. Savings and Loan League, and Roddie.

OHI is an unrelated offspring of ACTION, the American Council to Improve Our Neighborhoods, and is in effect its commercial sales promotion complement. Together, ACTION and OHI present a two-pronged private enterprise approach to the housing problem. One complements the other.

A seal adopted for the campaign shows an eagle and a home, with a

(*Continued on page* 64)

Live Better . . . Electrically

Telecast Launches Industry Promotion of Residential Electricity, Electrical Products

An estimated 35,000 businessmen, gathered in 79 cities throughout the nation, simultaneously watched the launching on February 8, 1956, of "Live Better . . . Electrically," a broad industry movement to increase the residential use of electricity and electrical products.

Through a closed-circuit split-screen television presentation, chairmen of trade associations participating in the promotion as well as other business executives were interviewed to give emphasis to the opportunities for accelerated marketing of electrical goods and services in residential areas and the benefits that can be derived therefrom.

Local Level Direction

Direction of the "Live Better . . . Electrically" promotion will be on a local level under each of the 100 sponsoring utility companies. Following the telecast, executives of these companies outlined their own plans of action to their guests and invited them to participate in the project. Local companies were hosts at the individual meetings throughout the nation.

The movement seeks to stimulate participation by manufacturers, home builders, contractors, architects, electrical distributors, dealers, realtors, and lending institutions on selling the benefits of increased electrification to the American home owner. It is expected that a large number of manufacturers, trade associations, and professional societies will become active participants in the "Live Better . . . Electrically" program as it develops.

National Background

Harllee Branch, Jr., President of the Edison Electric Institute and President of Georgia Power Co., who was interviewed during the telecast, has described the program as a coordinated effort which will involve local activities against a background of national promotion including trade and consumer advertising. He expressed a belief that the success of the over-all program will hinge largely on the extent of local cooperative action by utilities and their trade associates.

Of the movement's timeliness, Mr. Branch said, "Size and stability of the residential electrical market, coupled with expanding homes construction and modernization required by our steadily increasing population, indicates the need for an integrated approach toward mass market development by the whole industry."

In the telecast, during which television moderator John Daly acted as master of ceremonies and singer and actress Giselle McKenzie conducted interviews, Mr. Branch said: "If we can put across this broad concept of 'Live Better . . . Electrically' all segments of our far-flung interest will benefit economically. It will require the utmost cooperation of us all."

Another telecast participant, Oliver F. Burnett, President of the National Contractor's Association, told the viewing audience: "Home electrical modernization alone is an estimated $6,250,000,000 worth of contractor work. I have not the slightest doubt that the magnificent 'Live Better . . . Electrically' campaign will stimulate a most pressing demand for expanded electrical systems in the home."

Joseph B. Haverstick, President of the National Association of Home Builders, said: "Technological improvements in the home fundamentally are powered by electricity. The difference in cost between a substantial wiring system and one that just meets minimum requirements only amounts to a few cents over a period of the average mortgage."

"We in the architectural profession are eager to participate," George Bain Cummings, President of the American Institute of Architects, reported. "Home use of electricity is increasing all the time. The architect who insists on installing an adequate electric system becomes a better friend of his client through the life of the house."

The President of the United Savings and Loan League, Walter H. Drier, said: "Since the electrical living aspects of a house add considerably to its liveability, and hence its value, we have no hesitation in granting loans to be used for modernization, new appliances, or other items contributing to better electrical living."

Realtor cooperating was pledged by Walter S. Drayton, of the National Association of Real Estate Boards, who said: "Nobody knows better than the realtor how electrical modernization will prevent the depreciation of the investment in a home."

Benefits Summarized

The benefits of the program for all participants were summarized by Fischer Black, Editor and Publisher of *Electrical World*. Mr. Black foresaw these as: for utilities, greater demand for electricity; for dealers and distributors, more sales; for architects, exciting demands for modern living; for builders, better homes that are easier to sell; for the electrical contractor, more income from new home construction and renovations; for lending institutions, a more valuable home as security plus a huge market for improvement loans; and for real estate brokers, more marketable housing.

Others participating in the telecast included Miss Marian Mayer, Vice President and Executive Director, American Home; Robert Fiemster, Chairman of the Executive Commit-

(Continued on page 63)

The Philosophy of Reading

By Ralph M. Besse

Executive Vice President, The Cleveland Electric Illuminating Company

Reprinted from THE FREEMAN, January, 1956.

THE Research Institute of America made a poll of executive reading habits. I think the 5.4 per cent who refused to say what they read can safely be classified as people who read practically nothing.

Again, 4.6 per cent *admitted* they read nothing. That makes a total of 10 per cent who did not read. Further, 21 per cent read only one to six books a year, and 23.6 per cent from seven to twelve books yearly. That makes a total of almost 60 per cent who read twelve or fewer books per year.

Why don't people read more? "Because I don't have the time!" That is far and away the major reason given.

Finding Time to Read

There are two ways to find time to read. First, you must create the desire to read. Second, you must adopt some simple techniques to help establish the reading habit.

During the war years I dropped book and heavy magazine reading and spent most of my time with newspapers—to keep pace, I reasoned, with history in the making. That sounded like a logical decision, and I got almost completely out of the habit of reading books for three or four years.

Then suddenly it occurred to me that I wasn't learning much from newspapers, and not a great deal more from current news magazines—that is, not much of lasting value. So in spite of radios, three children and a television set, I concluded I had to go back to some serious kind of reading.

Creators of Interest

To encourage your own desire to read, you should be aware that two of the most important creators of interest are the things you feel responsible for and the things you get credit for doing. Hence, initial reading programs should be directed at something you like, that will help in your job, something which will bring you recognition, or that is related to things you feel responsible for. And those things for which you feel responsible can range all the way from your own home to aiding in the preservation of individual freedom in America.

Now, how do you actually get started reading? What are some simple techniques? First, you should realize that serious reading takes less time than many persons imagine. If you spend just 15 minutes a day, reading at the average rate of 300 words a minute, you will read a million and a half words a year—or an average of 20 books! But, of course, you have to devote these 15 minutes *every* day.

Sir William Osler, who was one of the greatest medical teachers of all times, did exactly that. He would take 20 minutes each day, as I recall, and he became one of the best-read doctors in the United States. I guess he cheated on the long side and would sometimes read much longer than that —but the core of his reading was a 20-minute schedule, either just before he got up in the morning or just before he went to bed at night.

Time Chart of Day

Another step is to make a time chart of your day. Find out what you do with your time. Most people don't know. Once you have found what your time-schedule is — once you have charted it—you can begin planning, and very likely you will find additional moments for reading.

Also, you will learn that you can read at almost any time, and in almost any place—even in the bathroom. I have read in the bathroom for years. I just finished reading Herman Melville's great *Moby Dick* in the bathroom. I had wanted to read that book for a long time, and that's how I did it!

Another suggestion. Read on the way to work. When I come to work on the Rapid Transit, I see many people sitting in their seats either dozing or looking idly out the window. They could be using that time to great personal advantage — reading a good book.

Newton D. Baker was an unusually well-read man. He was also a busy man—busy enough to have been Mayor of Cleveland and Secretary of War during World War I. He also founded a law firm and did much public speaking. But in spite of that kind of busy life, Newton D. Baker had read literally thousands of books. Asked how he did it, Baker replied: "I just fill in the little fence corners of my time reading."

Reading Material at Hand

By that he meant, he always had something at hand to read; and whenever he had time—even five or ten unexpected minutes—he would pull the material out of his pocket or brief case or off his desk and begin to read. So always carry a book or serious magazine with you — or keep one handy. If not in your pocket, then perhaps in your brief case or traveling bag or somewhere in your automobile—and certainly on a shelf or bedside table at home, and next to your favorite easy chair.

Another technique I find helpful is to read more than one book at a time. I read from eight to ten books at a time, for the reason that I'm not always in the same mood. Some evenings I will sit down fresh and vigorous and want to read something in science or nature or politics. Another time I may be tired and prefer something a little lighter. So I try to keep a variety of books on the move.

Deep Convictions Necessary

To really get started on such an extensive reading program, your own personal philosophy must have led you to certain deep convictions. Very likely you believe that education—especially *self*-education — is a good thing. Probably you want to assume your responsibility for good citizenship—you want to be a good citizen, wholly aside from your job or other personal responsibilities. And probably you want to improve your job performance, whether you're a mother and homemaker, or a corporation executive.

These three things have one point in common — all require *learning*.

Now, there are only three ways to learn:

1. From others
2. By thinking things out yourself
3. By experience.

I wouldn't discount the value of experience, but it is a very slow way of getting a really broad education. Thinking things out for oneself is even a better way—to the extent that we do it. But the quickest and most effective way is to learn from others—from the experience and thinking of millions of people over hundreds of years.

You can learn from others either by reading, by taking instruction, or by observation—or by a combination of these. But there is relatively little opportunity for observation, and not enough time for continued personal instruction. So that brings us back to reading as the most valuable learning method.

Key to Learning

Reading is actually the key to learning. Why? To put it briefly, because it is the most complete, most available, cheapest, quickest and most current source of learning! Further, it is a system of multiple learning—you learn more than one thing from good reading. And it is a method of continuous personal training for self-improvement.

First, reading is the *most complete* source of learning. Francis Bacon observed that "reading maketh a full man," and Thomas Carlyle said:

> "All that mankind has done, thought, gained or been: it is lying as in magic preservation in the pages of books."

There is no knowledge, practically speaking, that is not recorded some place in writing. The whole realm of knowledge known to man is written out—with very few exceptions.

Most Available Source

I have also said that reading is the *most available* source of learning. This scarcely needs proof. We can have magazines and other good literature routed directly to our desks or homes. We can buy it in almost any city block. We can borrow it from company or public libraries. It is readily at hand.

Further, reading is the *cheapest* source of learning. Almost all reading matter is available without any direct cost whatsoever—at a library. And even reading material that is inconvenient to borrow need not be expensive.

Again, reading is the *quickest* source of learning. Certainly it is far faster than formal instruction, experience, observation or thinking things out. Remember, the work of a lifetime is often recorded in a single book.

Most Current Source

Also, reading is the *most current* source of learning. Change is a major characteristic of our day. If we are to be effective, we must keep pace with change. Many things we learned in college may no longer apply. We can't keep going back to school—but we *can* read!

I also observed that reading is a system of multiple learning. In reading a single book we are apt to derive several different values. We learn the author's viewpoint or perspective, his analysis. We get sheer information or knowledge. We learn vocabulary. We can acquire a better form of expression by studying a good writer's style. And often we get entertainment value, too.

Continuous Self-Improvement

Finally, reading is a method of continuous personal training for *self-improvement.* It constantly challenges your thinking processes and so can train you in good habits of thinking. It provides the discipline for gaining new fields of knowledge. Reading allows you to train yourself. And this self-training becomes easier the more you read. Each broad field of knowledge you add to your store helps in other fields of knowledge. As Alfred North Whitehead put it:

> ". . . The more you know, the easier it is to add to your knowledge."

What to Read

Having touched on the merits of reading and the techniques of going about it, we naturally come to the question: What shall I read? The answer varies greatly from person to person, but here are some comments that may have broad application:

Newspapers. There is some opinion among great minds that newspapers are a waste of time! Justice Holmes thought that, and certainly the word-by-word reading of the average daily paper is not justified. These papers should be skimmed. This is the place for speed reading—with a great deal of skipping. But do not skip the editorials; they should be the most important part of a local newspaper.

Magazines. Here, generally, is a higher grade of writing. Newspaper reporting rarely permits the kind of investigation possible in magazine writing. A specialty magazine is certainly a must. If, for example, your specialty is business management, you are apt to find the *Harvard Business Review* invaluable. Or if you are eager to learn more about the libertarian philosophy of private property, free market and limited government, very likely you will read *The Freeman.*

Miscellaneous Publications. A check at your library will reveal there are a great many of these. One type is the "economic letter." Some of the banks put these out—such as The Federal Reserve Bank of Cleveland, The Cleveland Trust Co. and The First National City Bank of New York. In the field of economics and government, a great many excellent pamphlets, booklets and articles are available from the Foundation for Economic Education, Irvington-on-Hudson, New York.

Books. Books present the finest of all reading opportunities. The greatest thinking of the finest minds, the finest expression of the greatest writers and the most profound learning of qualified experts in every field and every age is available in books.

Selection of Books

Everyone must decide for himself what books he should read; but in the selection of books by subject matter, there is an old adage that is well to keep in mind:

> "Shallow minds are concerned with people. Average minds are concerned with events. Great minds are concerned with ideas."

More specifically, here are some pointers on book selection:

1. Don't hesitate to reread the very good books.

2. Don't hesitate to read only a part of a book—if only a part serves your purpose.

3. Try to read only the *best* books.

4. Don't hesitate to read a cheap paper-backed edition of a good book.

5. Don't be afraid of any subject merely because it is published in a book. Justice Holmes said: "It is absurd to be afraid of any book."

(*Continued on page* 63)

The New England Flood Control Story

By Clarence W. Mayott
Consultant, The Hartford Electric Light Co.

TO many people the term flood control means flood prevention. A clear understanding of what is actually possible and what is being done about it is of great value.

While man has made great advances in using and controlling the forces of nature, there are many forces that are at present beyond his control. Temperature, rainfall, hurricanes, and tornadoes can only be observed and followed, not directed. Temperature and rainfall determine our floods. Floods are not of uniform amount over an area and not any two floods occur over exactly the same area.

The greatest recorded flood on the Connecticut River was in March, 1936, and this was due to some six inches of rain falling on snow which also contained some six inches of water. This came from the mountains of New Hampshire and Vermont. The temperature over this two-week period kept above freezing. The September, 1938, flood came from a hurricane which deposited heavy rainfall over the whole river. The third largest flood flow in the Connecticut River at Hartford was in August, 1955, from Hurricane Diane of which 80 per cent was from Massachusetts and Connecticut. A major part of the October, 1955, flood was in Central and Southern Connecticut.

Flow Per Second

Some of the river flows from this hurricane and from the previous highest floods, all in cubic feet per second, are shown in Table I.

This table gives an indication of the area's diversity in floods. Note that while 72 per cent of the 1936 Connecticut River flood peak at Hartford came from above Turners Falls, less than 10 per cent of the August, 1955, peak at Hartford came from above Turners Falls.

The 1955 flow in the Naugatuck was three to five times the previous high, with a flow at Naugatuck four times that at Thomaston.

Completed Dam

Because of the storm's pattern, the only completed flood control dam that was effective on the Connecticut was Knightville on the Westfield River. The only proposed dam on the Connecticut or the Housatonic Watersheds was the yet-to-be-built Thomaston Dam. This dam would have reduced the flood height at Waterbury by possibly 20 per cent to 25 per cent.

Common Cause

A material proportion of the damage caused by the August and October, 1955, floods was due to restrictions of the stream—in other words, lack of free space for the water to pass. Structures had been built into the actual bed of the stream and in some cases over the stream. There just was not enough area for the water to get past without piling up. In some cases drain pipes were covered over.

Bridges in many cases acted as dams and were swept away by the pressure against them.

TABLE I

	Previous High	*August, '55*
Connecticut River at Turners Falls	206,000—1936	19,500
Chicopee River at Indian Orchard	45,200—1938	50,000
Westfield River near Westfield	55,500—1938	61,000
West Branch of the Farmington at New Boston	18,500—1938	35,000
Farmington River at Rainbow	26,600—1936	62,000
Park River at Hartford	5,650—1938	18,000
Connecticut River at Hartford	289,000—1936	200,000
Housatonic River at Stevenson	69,000—1936	69,000
Naugatuck River near Thomaston	10,200—1948	35,000
Naugatuck River near Naugatuck	28,500—1948	140,000

Control Points

While there is no way of controlling either the amount or the location of rainfalls and the resulting floods, there are ways of reducing their detrimental effects. This is what is meant by the term, "Flood Control." Some of the ways are: 1. Large flood dams on the lower reaches of the tributary streams. 2. Dikes—such as at Hartford. 3. Small flood dams on the upper reaches of the tributaries. 4. Absorbing coverage (forests, etc.) on the hills and valleys. 5. Keeping stream beds unobstructed. 6. Zoning. 7. Flood Warning.

The most popular of these is the first—large flood dams on the lower reaches of the tributaries. This can be most effective in reducing the flood level in the main stream. These dams can hold large volumes of water and let it down at a low rate after the flood has passed. The larger the dam, the more valley land is taken over for flood control purposes and removed from productive use. This is a loss to the local people, and in many cases the state, for the benefit of others—in many cases in another state.

The Engineers Corps of the U. S. Army is the Federal organization which traditionally has been authorized to make studies and to construct large flood control dams, dikes, levees, and stream dredging. The U. S. Department of Agriculture has been authorized by Congress to assist in construction of small upstream dams for flood control. These would be in the upper regions of the tributary streams. We thus have two Federal Bureaus involved in the flood control program and Federal Bureaus are not traditionally too cooperative. Very little has so far been accomplished on the Department of Agriculture program. The flood control discussion on the Connecticut River relative to the Connecticut River flood of 1927 had much discussion, but practically no action till 1935 when a CVA Bill was introduced in Congress to establish a TVA in the Connecticut Valley. Such

bills have been introduced quite regularly since then. Just previous to the March, 1936, flood the Army Engineers Corps had prepared a proposed system of flood control dams. In 1937, the four Connecticut Valley states formally ratified a Connecticut River Flood Control Compact which was not approved by Congress. The 1938 flood increased the pressure for flood control dams and caused changes in the Army Engineers' proposed program. After much discussion and considerable controversy, five flood control dams were authorized by Congress and have been completed.

	River
Union Village—Vt.	Passumpsic
Surrey Mountain—N. H.	Ashuelot
Birch Hill—Mass.	Millers
Tully—Mass.	Millers
Knightville—Mass.	Westfield

Some 21 others are on the Army's long-range list. They are on paper, awaiting final Congressional action.

Ingenuity At Work

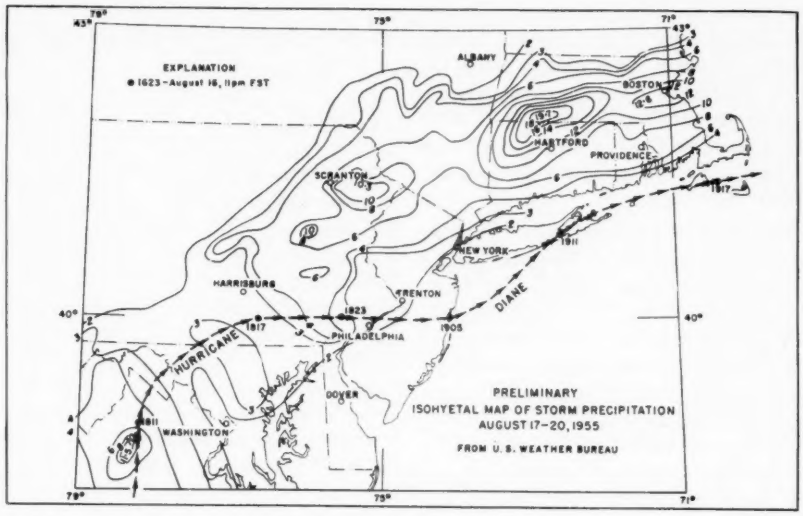
In 1953, the legislatures of the four states of the Connecticut Valley approved an Interstate Flood Control Compact for the Connecticut Valley. On June 6, 1953, Congress granted its consent and approval to this interstate compact which covers the Connecticut River Valley. It had been previously ratified by the states of New Hampshire, Vermont, Massachusetts, and Connecticut. Among the principal purposes of the compact are:

1. Resolving the tax loss problem involving Federal ownership of reservoir lands.

2. Assuring adequate storage capacity for impounding the waters of the Connecticut River and its tributaries in the interest of flood control.

3. Providing a joint or common agency through which the signatory states may effectively cooperate in accomplishing the objectives of flood control and water resources utilization in the basin.

The Compact provides also for the creation of a commission consisting of three representatives from each of the four states with authority to enter into contract and agreements and to make studies and investigations in cooperation with the Corps of Engineers and other Federal agencies for flood control and other developments of water resources.



This isohyetal map shows the rainfall from Hurricane Diane. The solid lines connect points which had equal rainfall for that period, and the figures indicate the inches of rainfall.

Provision is made in the Compact for the payment by Connecticut and Massachusetts of a portion of the taxes lost in the states where the flood control reservoirs are located. This includes the five reservoirs that have been completed as well as any future flood control reservoir to be built both at sites named in the Compact and also at other sites built by the U. S. under flood control law. It included approval of 11 flood control dams. At the New England Governors' Conference, September, 1955, six dams were selected for immediate recommendation to Congress.

They are Barre Falls, Mass.; Otter Brook, N. H.; Ball Mountain, Vt.; Townshend, Vt.; North Springfield, Vt.; and North Hartland, Vt.

Maximum Economic Program

The whole flood control dam program only calls for what is considered to be the maximum economic program. This program calls for the holding back of some six to seven inches of rainfall, on 25 per cent of the watershed. This reduces the peak of the flow to be retained till the peak flood has past. While the flood control dams provide the largest effect toward the holding back of water from the main stream, it is unwise to belittle the value of the many other methods of reducing flood damage.

While we are talking about floods we must not lose sight of the fact that it is just as essential to have water for drinking purposes and industrial uses during the drought periods.

Forked Tongues

For many years there has been a concerted drive to force Federal power upon the New England area. This drive has been mostly from outside of New England. It has been in the form of an attempt to hook so-called multiple-purpose dams into the flood control program. The claim is that this would furnish low cost hydro power and pay for the project.

Our recent floods have been used to accelerate this "demagogic" attack on the utilities as being the cause of the flood damage by such absolutely false statements as this:

"The people of New England can blame private power lobbies and some of their Republican members of Congress for their tragic plight . . . adequate flood control in New England is only feasible if federal multi-purpose projects are built which also produce low-cost electric power . . ."

Leland Olds, Drew Pearson, C. I. O. Textile Workers, and many others have been making such wild statements without any basis of facts.

The Truth

The New England-New York Inter-Agency Committee report of 1955 gives a complete inventory of feasi-

ble hydro projects and flood control dam locations. This report shows there are only two hydro sites in New England where hydro power may be produced as cheaply as steam. These are the Enfield project in Connecticut and the St. John project in Upper Maine.

The NENYIAC report shows them to be just slightly better than steam if used as peaking power on a very large system. The NENYIAC report, however, showed no multiple-purpose flood control power sites where hydro power could be produced as cheaply as steam. This report listed two projects that U. S. Army Engineer studies showed were worthy of consideration but neither proved to be cheap power. Power costs from both would be greater than from steam. The Hartford *Courant* in its issue of November 19, 1955, quotes Brig. Gen. Robert J. Fleming, Sr., Chief of Army Engineers of the New England Division in Boston, as follows:

"The General maintained that flood control dams in New England should be for that purpose only, and he criticized proposals which have been made in recent months that the power possibilities of such dams be exploited.

"'Power and flood control in New England,' he said, 'are like oil and water—they just don't mix.' Gen. Fleming explained that a flood control dam to be effective must be kept empty, and that a power dam, if it is to produce power, must be kept full. So-called multi-purpose dams in other parts of the country, he said, are actually a series of reservoirs in one dam. He said New England offers 'only two possibilities' for multi-purpose dams from an engineering point of view, and 'none from an economic point of view.' He did not specify the two possibilities."

TABLE II

Item	*Manchester, N. H.*	*Williamston, N. C.*
Payroll Taxes:		
Federal O.A.B.	$ 16,024	$ 12,613
State Unemp. Insur.	28,843	19,340
Fed. Unemp. Insur.	3,205	2,522
Workmen's Comp.	7,157	5,920
Group Insur.	5,713	4,806
Fire Insur.	2,239	2,959
Vacation & Holidays	68,370	39,942
Property Taxes	21,110	15,000
POWER	73,920	69,174
Fuel	14,250	12,550
Water	750	3,000
Variable, Fixed Transfer	54,000	53,920
Total Payroll	1,141,015	840,878
Grand Total	$1,446,596	$1,082,624
Difference—$363,972		

Tariffville Station of The Hartford Electric Light Co. is shown as it was swept by the floods caused by the hurricane. Damage like this was widespread.

Old Joke

One of the principal arguments of these proponents of Federal power at multiple-purpose dams is the false claim that the cost of power in New England could be materially reduced by greater development of hydro and that the cost of power has been driving industry out of New England.

In the first place, the New England Council has for many years had a reward of $100 to anyone who could prove that power costs were a material factor in any migration of New England industry. There have been no payments to date.

In the second place there are many other more important items of industrial costs that far overshadow any power differential as shown in the following from the Manchester *Union Leader*, Manchester, N. H., Wednesday, March 16, 1952: "Textron Report Compares Costs of Northern, Southern Plants—Manchester, Williamston Operations Reveal Edge, Company Declares Local Mill Can Produce Same Total as Rival Only At $363,972 More in Expense."

Remember, every bit of the two

(*Continued on page* 63)

Estimating Meter Readings for Final Bills

Prepared by a Subcommittee of the EEI Customer Accounting Committee Under the Chairmanship of C. R. Gibbons

WHY is this subject of current interest? One reason is that customers are better served and another that the utility renders service at a lower cost. The first is a logical part of a customer service and public relations program, and the second fulfills the obligation to operate as efficiently as possible, consistent with good service. To achieve the maximum in economy, the estimation of final readings should accompany the practice of leaving services energized.

What has been done to provide for the continuity of service and elimination of customer inconvenience under prevailing economic conditions and what have the utilities gained? Much is being written today concerning the large percentage of households in which all adult members are absent from home each day engaged in business, professional, or other work. Customer contacts and access to meters and customer facilities are very much affected by this condition.

Migration of Population

Then too, we have a greater migration of population both within and without the areas served by each utility, thus there is a continuous uninterrupted flow of customers coming on and off utility lines. The prevalence of moving from home to home both adds to the expense of operation and causes customers inconvenience. Another factor is the extended use of electric service for water heating, furnace operation, air conditioning, refrigeration, and similar uses. Customer and public relations can be seriously disturbed by such results as food spoilage, a water system freezing when a tenant orders service off without the landlord's knowledge, and so on.

Another prevailing practice in many utilities now provides that orders are accepted from customers by telephone without further confirmation, generally including residential and small commercial customers. In most cases, if a security deposit is required, it is obtained by mail.

To give better service to customers and thereby gain better customer and public relations, and in addition accomplish a dollar savings, services for residential and in some cases small commercial premises are left energized so that the customer has immediate service without the inconvenience of having to contact the utility, then await the restoration of service either before or after occupancy. At such times, the customer is quite occupied with the problems of moving and getting situated. Certainly with the use of major electric appliances and devices such as stoves, freezers, refrigerators, washers, dryers, furnace blowers, and thermostatic controls, this service is even more important. The utilities adopting this practice report that customers appreciate the convenience and that having electric service available has been accepted and is expected.

Problems arising through leaving services energized cause some additional work. There are customers who move into residential premises and use service without notice to the utility. In other instances, use appears on meters sometimes as a result of work done by contractors and landlords or prospective tenants viewing the premises. These cases, of course, can be investigated and handled by contacting occupants by telephone using telephone address directory, contacting owners, managers, or agents to obtain names of new occupants and date of occupancy, addressing letter to "The Occupant," disconnecting services if no service request is obtained, and investigating unaccounted for use of service.

By eliminating the physical disconnection and reconnection of services, etc., the following can be discontinued:

Trips to disconnect, seal, or otherwise discontinue service.

Trips to reconnect or otherwise re-establish service.

Special trips to give service to customers who did not give advance notice of moving.

Appointments necessary to gain access to locked premises.

Customer contacts to request service at specific times.

Labor required after normal working hours for customer contacts and work at customer premises.

Company advantages realized other than monetary are the elimination of work peaks, clerical, and field efforts to get customers disconnected and connected, many practically on the same day. This means no "after hours" operating work, no frantic calls from customers, a minimum of diverted man-hours from other work, and that all orders can be routed and handled in a more orderly manner.

Leaving Service Energized

How about estimating final readings? A considerable savings is achieved when services are left energized. However to give prompt attention to the off customer and obtain the full economy, final bill readings should be estimated so that no trip to the customer's premises will be necessary to disconnect the service and obtain a final reading or to reconnect the service and possibly obtain an "on" reading. In other words, the practices of leaving services energized and estimating final bills are directly related. Many times this work is performed by the same employees and the final readings are incidental to the main job of physically disconnecting the service.

For some utilities, the practice of estimating final readings has been successful for a long period of years and customer acceptance has been good. The consideration of this or any practice must be viewed in relation to each utility's circumstances such as area served and methods of operation. Due to the continuous

upward trend in customers' accounting and collecting function costs, it is imperative that practices be adopted, again to operate as economically as possible and still provide good service.

Eliminates Reading Cost

A substantial saving can be effected by eliminating the expense of obtaining final readings in addition to the concomitant cost of disconnecting and reconnecting services for residential and possibly small commercial customers. The policy of estimating final bill readings usually is adopted for the convenience of customers, to issue final bills more promptly, to expedite the collection of final bills, and to reduce labor and transportation costs.

It was mentioned that customers are in the throes of a moving operation and occupied with moving problems. Therefore, it is very helpful not to have to arrange and wait for final readings. A last minute appointment for a final reading can be ill-timed and therefore exasperating for the customer about to depart. Why not make moving easier by advising the customer when he contacts the utility that, for his convenience, a final bill can be rendered promptly based on his previous kilowatthour usage? No trip to the utility office will be necessary and his payment can be mailed. He can be told that it has been a pleasure to serve him and asked if any assistance can be given at his new location.

Prompt Bill Presentation

By estimating final readings, customers can promptly be presented with final bills either directly or by mail. Those leaving town have the opportunity of making payment at once thereby saving time and the annoyance of waiting for final bills, and then mailing payments later. By expediting the preparation of final bills, an improvement in final bill collection practices can be effected. Many times customers can be contacted before they leave the service location. The economy realized by not having to journey to the service locations for actual final readings is apparent without an explanation. Depending upon the area served, the average cost of obtaining final readings may be up to $3.50 or more per reading.

By billing the customer over the counter and obtaining payment of the final bill, there is a saving in postage for the final bill. There is also a saving in cost due to the fact that it is not necessary to trace final bill addresses and to send out final bill collection letters. The possibility of a final bill charge-off is also reduced.

Information assembled by the EEI Customers' Accounting Committee indicates that there is no set of characteristics for a utility which might preclude the practice of estimating final readings. It was disclosed that no marked variation exists in the percentage of rural or suburban customers to total customers of utilities now estimating and those which do not. Readings are estimated by monthly and bimonthly reading utilities. It appears that neither the size of rural or suburban population served, nor the method of billing used are reasons for not estimating.

General Policies and Procedures

Generally the policies and procedures followed for estimating final readings are as follows:

1. Estimated final bills are rendered to residential and small commercial customers.
2. Final bills are estimated based on prior period usage. Abnormalities in the usage of the previous month or months should be recognized, in which case the prior trend, the same month of the previous year, or some other fair estimate should be used.
3. Actual readings are obtained if an estimated final bill is not acceptable.
4. Customers are informed that an estimated final bill will be rendered.
5. Estimated final bills are marked "Estimated."
6. Refunds are made on final bills overestimated.
7. Generally no additional bills are rendered on final bills underestimated.
8. Accounts are opened on the basis of the estimated readings for the closed accounts.

All utility companies may not use the same explanations or approach when customers request that service be discontinued. In one company, if a customer personally visits the office to request that his service be discontinued, he is advised that a final bill can be prepared immediately on an estimated basis and that he will save time by receiving and paying the final bill immediately. Usually actual final readings are obtained only when requested by customers or some unusual condition exists. When customers call on the telephone, the necessary information is taken from the customer and he also is advised that an estimated final bill will be rendered for his convenience. Many times customers pay little or no attention to the estimated bill statement and attach no importance to the transaction.

Presenting the Plan

The success of the estimated final bill policy depends on the knowledge and ability of the employees handling customers. The manner in which the plan is presented and explained can readily result in a negative answer. For instance, where employees ask "Do you want your meter read?" or "Do you want a final reading?" the normal answer is "Yes." This is a matter of employee training and experience.

It is also necessary to have a rational adjustment policy and commercial offices usually exercise considerable discretion in making adjustments. Some adjustments are unavoidable for such reasons as customers not having used electricity due to being away, or an error in a previous estimate. The use of the opening estimated readings for the succeeding customer may also be questioned and in such instances adjustments may be made.

Customer Acceptance

As under the policy of leaving services energized, customer acceptance of the estimating practice has been good. To conclude, customer acceptance of any policy and practice of estimating final bills then depends on (1) reading of meters at regular meter reading time whether the account is open or closed, (2)

(*Continued on page* 63)

Let's Close Ranks and Sell

By W. V. O'Brien

Vice President, General Electric Company

An address before the National Industrial Electrical Heating Conference, Cincinnati, Ohio, February 6, 1956

ON the occasion of the celebration of his 80th birthday, Roger Babson, the great economist, made the observation he envied the young men of today because they are on the threshold of a third great renaissance in human history.

Mentioning the printing press as a significant factor in the first renaissance, and the steam engine in the second, Mr. Babson pointed out that atomic energy and mechanization point the way to a future of boundless opportunity.

There is a great truth in those observations. The dominating characteristics of our future do *indeed* seem to be the atom, the source of power, and in mechanization, the utilization of power.

They come to us, as all great ideas do, with our having mixed feelings about them. Some look wistfully to the past when in their minds atoms existed only in the chemistry books and mechanization only in the dim future.

Others are almost highly optimistic that with atomic energy and mechanization or automatic factories all of man's problems will be solved merely through pushing buttons.

Using Both Concepts

However, the great majority of us share neither point of view. Instead, we are simply working hard to get the best possible use out of *both* of these new concepts. Atomic energy and mechanization come to us in an age of almost unparalleled prosperity—an age of learning, of research, and even a measure of peace. We are almost dazzled by the unlimited opportunity stretching out in front of us.

But despite all these things, I am not satisfied—and I suspect, neither are you. Why this paradoxical situation?

Perhaps the answer lies in the kind of people who make up the electrical industry. We in this industry have never been satisfied with the status quo. We are the probers, the pushers, the never-give-up fellows who always want something new. Almost, you might say, the *dissatisfied* people of the industrial world.

Creative Dissatisfaction

But it is a creative kind of dissatisfaction—the kind that led you to form your Industrial Electrification Council and to be holding your second annual National Industrial Electric Heating Conference here this week.

You fellows are never satisfied. You want to find new and better ways to increase production, to improve quality and reduce costs through the widest and most practical use of electric heating. In short, you're my kind of audience because I am completely and wholeheartedly in sympathy with your objectives.

I will not attempt to add to the store of knowledge you have received and will receive the rest of the week on the subject of electric heating. Your roster of speakers and their subjects looks significant and impressive.

Rather I will suggest a point of view—a salesman's point of view—on how best we can *use* the new ideas and techniques you have created, how best we can enjoy the blessings of this third renaissance.

I want to touch briefly on three major points. First, the climate of our business economy. Second, the problems and opportunities which face us. Third, what we can do about those problems and opportunities.

Business Economy

First, the business economy. While your specific interest here is industrial electric heating, all your plans and outlook for the future are influenced by both the short- and long-range business climate ahead.

The short-range outlook for 1956 is, as you know, in one word—optimistic. You have read the various forecasts, including a recent one from the National Industrial Conference Board which estimated our Gross National Product would be up 3 to 4 per cent in 1956. There may be some adjustments over the months, but most forecasters are predicting that we will go on to higher levels than ever in the future.

Interesting and hopeful as these short-range forecasts are, the long-range ones are even more significant to us. Long-range forecasts give us time to do something about changing the conditions in our favor. They give us time to make business plans, to do positive, creative thinking that will help our customers. They give us time to think and plan together as an industry.

There is a poster at the entrance to the buying offices of The Kroger Co. in St. Louis which reads:

> "Notice: If you want to sell your product to our Company, be sure your product is accompanied by a plan which will so help our business that we will be *more anxious to buy* than you are to sell!"

That's the concept I hope you'll keep in mind as you go about planning for the future of ways to help your customers in such a way they'll be as anxious to buy as you are to sell. Let us see how the two factors I have mentioned previously—atomic energy and mechanization—will influence our life in the future.

Atomic Energy

First, atomic energy. Are we going to have the imagination, the foresight, and the long-range plans necessary to convert atomic fission from our major source of fear into one of our major sources of fuel in the next century?

While conventional fuels such as coal, gas, and oil are in ample supply to continue to provide low-cost electric power generation in the years immediately ahead, eventually additional fuel sources will be needed if the electrical industry is to maintain its rate of doubling in growth every decade.

If private industry is given the opportunity to proceed with the devel-

opment of atomic power, it is our optimistic estimate that, by 1976, 50 per cent of new electric power installations will be atomic. This does not mean we underestimate the role of conventional energy fuels. The world will continue to use coal, gas, and oil in ever increasing quantities.

Fusion of the Atom

Today we are dealing in fission or the splitting of the atom, but tomorrow the main emphasis may well be on the fusion of the atom. In mountain climbing you can tell when you have reached the top of the peak. In science there never seems to be a peak. From any given starting point, the peak often appears as a clear-cut terminus. But when you get there, you find that it is only a shoulder of the mountain. Another peak lies above.

For example, once we thought the molecule was the indivisible building block of nature. Then its structure was discovered and elucidated. Later the atom played a similar role and was presumed to be the ultimate unit of matter. Now the nucleus of the atom is being revealed in its detailed structure.

Two centuries ago Jonathan Swift made an observation that seems to apply here. He said:

"So naturalists observe, a flea
Hath smaller fleas that on him prey:
And these have smaller still to bite 'em;
And so proceed ad infinitum."

In the field of atomic energy, from fission to fusion, we may well "proceed ad infinitum," as new mysteries and benefits are unfolded to us year by year.

Mechanization

So much for a unique and promising new power source. Now to discuss the second part of Mr. Babson's comment on the third renaissance, mechanization or the utilization of power.

Whatever you may choose to call it, mechanization or automation, it definitely is influencing and will influence our lives in the future. The trend to automation or the automatic factory is one of the great challenges and opportunities of today.

Too often the automatic factory is spoken of in fear, as if we were planning to make men the slaves of machines. The opposite is true. We must plan mechanization or automation in our business wherever possible if we are to meet the production demands upon us. And we must explain the implications of mechanization and automation to our customers.

Parenthetically, let me add that as part of our More Power to America Program at General Electric, we have recently issued a program which does just that. Many of you have seen our color motion picture, "This Is Automation," and reviewed our manual. This program is available for any of you to use either through your electric utility or through your local General Electric sales office.

The breath-taking things that are being accomplished in the field of atomic energy and in automation remind me of a slogan I saw hanging over the desk of a Navy officer recently. It said: "If it works, it's obsolete." A shocking concept perhaps, but it gives us a point of view on how fast the scientific world is moving.

Examples of Renaissance

The only reason I mention atomic energy and automation is to point them up as examples that we truly are in a third renaissance of learning and doing. These two concepts not only will affect us during our lifetime, but go even further into the lifespan of our children.

As we move into this breath-taking decade ahead, we can reflect for a moment that we have left behind 10 years of order taking since the end of World War II, plus five years of war before that. This was a period when no one in the electrical industry had an opportunity to carry out a consistent and sustained selling program.

Salesmen had to wait while generating capacity was installed and availability of facilities and materials permitted a free flow of electrical materials. But today—and tomorrow—for the first time in many years, the entire electrical industry is ready to move forward together. Electrical manufacturers, electric utilities, contractors, consulting engineers, distributors and dealers, all of us have a common opportunity.

No longer are we held by threatened shortages of power, by lack of materials, or by a shortage of customers. Barring war or major world upheavals, we have no excuse in the year ahead for shortages or failures of planning which have so handicapped us in the past.

Now, lest I be accused of encouraging you to become complacent at this state of affairs, let me hasten to say that we have fast-footed, fast-thinking, and alert competitors who are also seeking to capitalize on the favorable economic climate.

Two-Dimensional Selling

That is why I say that the time has come for us in the electrical industry to *close ranks and sell.* The kind of selling that I am talking about is a two-dimensional job calling for a casting off of the bonds of conventional thinking. Instead, let's think of it this way:

Our first real job is to develop a market for our electrical way of doing things—to create a climate in which all of us can operate. This calls for us working together in a common or community effort to sell the electrical concept to our markets—working as an industry rather than as individuals concerned only with our own orders.

The Industrial Electrification Council is an example of what I mean. Here is an ideal place to appraise our market. Here is an ideal place for us to pledge ourselves to the community of interest approach of selling the idea.

Now, let me admit that we can perhaps reach the high goals the economic forecasters say this nation will need by 1965 by doing it the same old way—each of us as individuals independently serving our own interests. But that is the hard way to do the job. It will take longer and cost more than if we jointly set down our common long-range objectives and work as a group to achieve those objectives.

A Mutual Clothesline

What we need is a set of goals or a common theme as an electrical industry for all of us to subscribe to in the next ten years. Call it a clothesline if you like, on which we can hang various mutual efforts such as educational courses, forums, promotional themes, and the like.

Of course, this a departure from the past and accepted way of doing

things where we sold the market just through our own line of products and services. But if we as an electrical industry can get that long-range look at our market, set some goals, then our selling job as individuals will be easier.

Natural Sales Allies

The kind of program I am talking about, of closing ranks and selling, would mean we would work even closer with our natural sales allies. Contractors, consulting engineers, dealers, distributors, and, yes, even others like the security analysts, bankers, and the financial underwriters.

And don't underestimate the keen interest of the financial people who come in contact with the ultimate customer or the influence they have with him. They have very probing minds and are very interested in anything that will make their customer's business more effective.

Having advocated a community or joint effort, let me hasten to add that there is a second dimension to this selling job. Not for a minute do I propose that we lose the individual effort of the salesman. Underneath this joint effort there is the hard sell of the individual salesman for his line of products. But he will be selling in a more favorable climate if some "pre-selling" has been done for him through the joint effort I mentioned.

This "pre-selling" can be accomplished best by having a national organization such as the Industrial Electrification Council setting up national goals and objectives with the rest of us gearing to these goals at the local level.

Decentralization Trend

To make any program like this successful, I'm convinced it has got to be done at the grass roots or local level. A central organization for planning and a local organization for doing. That's the trend in industry today—decentralization.

The local electric utility is, to my mind, an excellent local focal point to get the common goals of the industry carried to the customers. They are the ones who can use various sales promotional tools that may be supplied, for example, by the electrical manufacturers as their contribution to the common good of promoting the industry.

And we can do more as an industry than just promote the electrical way of heating and powering our customer's equipment. We also can contribute and sell brand new concepts that will actually improve our customer's product.

Improving his products, providing him with better ways of doing things are primary benefits that your customer is bound to heed. Probably there are several competitive sources of power to electricity including gas, oil, diesel power, and so on that he could use to do the job.

But if we can bring him the benefit of your creative thinking to make his product better, to improve it, then you've really got his attention. Perhaps there's a method of bonding aluminum, perhaps a way of anodizing another metal that will enable him to effect a basic improvement in his product. In meetings like these we can exchange ideas for the common good of each other.

Perhaps Too Individualistic

Perhaps in the press to attain our individual company objectives we have become too individualistic in our approach to this mutual industry problem. Perhaps we have become too concerned with selling against each other rather than in working with each other and both gaining ideas. Certainly there is room for all of us to cut out any bickering who should get the credit for this or that idea first and close ranks and advance together.

Perhaps we should measure our plans and our progress by what we are doing to promote a project such as mechanization or automation. Never before have we truly put our efforts together in all segments of our common electrical industry.

When we leave here, we can leave as some 200 different selling agencies, but we don't have to let it be that way if we will tie our efforts together for the common good. We don't have to let it be that way if we can realize what's good for our industry is good for us as individuals, if we can realize that everyone in the industry is or could be a partner in attaining our common objectives.

Now I am not naive enough to suggest that we should back away from our obligations to our shareowners or that we should fail to sell our own products. Not at all. Rather I am suggesting that the job is so tremendous that it needs the combined work of all of us to make our individual efforts even more effective in moving forward this nation's economy in the ten challenging years ahead.

Good Code of Ethics

If we'll apply that measure to our efforts—doing what is right and necessary to move ahead our nation's economy by combining our ideas, promoting market development, better ways to manufacture products, and so on—then that will be a good code of ethics for us.

May I suggest six specific things we can do in closing ranks and selling. They are not so much selling techniques as they are approaches to selling. Approach number one is is modernizing our sales effort. Today's selling calls for recognizing and planning in every area that affects the total distribution cost. Things like market research, accounting, financing, advertising and sales promotion, application engineering, warehousing, transportation—in short, everything that has to do with the distribution and marketing of goods. In General Electric we have a Distribution Group at the top level of our organization with an Executive Vice President in charge.

Modernized sales efforts call for adjusting our sales efforts to changing conditions. Decentralization throughout industry has meant that sales management has had to deploy men differently, recognize changing market situations and a need for over-all planning to cover these markets.

Consistent Sales Effort

This ties in very well with my second approach which is consistent sales efforts that are not affected by short-range economic adjustments or short-sighted sales management. Sales efforts cannot be turned on and off without damage to your whole system. It is axiomatic that sales successes are hard won, but easily lost.

How important it was to us right through the shortages of the Korean War to recognize our obligations to our customers and to prove to them we wanted to do all we could to help them, even though the last thing we

could handle at the moment was more business. You have to take the long view in selling if you plan to have a long life in the business.

Effective People Necessary

To sell effectively you must have effective people. One of the discoveries, simple as it may seem, is that effective people do not happen by accident. In the first place, you have to know what kind of people you want to sell. Secondly, you have to go out after them in a highly competitive market. Then you have to train them, compensate them, and inspire them to secure their full creative effort.

In addition to the millions of dollars a year we at General Electric spend on formal training programs, we have been holding seminar discussions with all of our top managers and specialists for the last year and a half on all phases of manpower development.

The first of this year our new Management Research and Development Institute opened at Crotonville, N. Y., where every 13 weeks a new crop of managers will retire from the world to study the subject of how to effectively manage people and become more effective themselves.

While General Electric's management training program may not be possible or practical in many companies, certainly some form of training is essential to develop competent salesmen and people to manage them. It is encouraging that so many companies are awakening to this need to develop people faster and more accurately than the old trial and error method that wasted entire lives because a man was improperly placed or improperly trained.

Market-Oriented Planning

The fourth approach I would recommend is planning oriented to markets. As I said before, let's think of selling to a market first rather than to an individual customer. After we have provided everything we need to sell to a market, we will find that the second logical step of orienting our planning to the individual customer will be much easier than if we had done this first.

We can close ranks in the industrial electric business by thinking together at meetings like this in terms of selling to a market. Then, as individuals, we can think of planning oriented to an individual customer.

Now that you have done your planning, gotten your people in place, and thought in terms of the market, let me recommend my fifth approach—that of creative selling. Now doing creative selling does not mean that one has to be particularly original.

Once upon being complimented as a great inventive genius, Thomas Edison replied: "I'm a good sponge. I absorb ideas and put them to use. Most of my ideas belonged first to other people who didn't bother to develop them."

And many times one idea will mean another is necessary. Recalling Edison again, once he had invented an electric light that would burn for a period of time, the battle had just begun. Turbines, switchgears, motors, and a hundred and one other things all followed in rapid succession.

More Power to America

Ten years ago at General Electric we set out to deliberately speed the pace of industrial, commercial, and community and farm electrification. We called this program More Power to America. Two of our first promotional programs were in the electric industrial heating field.

Since that time we have added many ideas and techniques, but have never swerved from our original purpose of showing people how they can live better through using electricity more effectively.

These MPA programs are available to all in the electrical industry to promote an idea, to create a climate of sales. In our More Power to America library of motion pictures and slidefilms are some 25 programs available for your use to help you create a climate for sales.

Another creative selling technique which you may want to adapt or adopt is our series of forums. These are in three fields. One of these is the Industrial Productivity Forums in which General Electric teams with an electric utility for a day's program with guests being the top industrial leaders of the area. How to increase productivity through electrification is the subject matter. Are they successful? Ask more than 13,000 key industrial executives plus electric utility managers from coast to coast who co-sponsored some 70 of these forums.

Maintenance Forum

Another type of forum is our Productive Maintenance Forum. Key people in the maintenance area are invited to hear talks, see a motion picture, and perhaps take a tour through our General Electric Service Shops. The response has been outstanding. Why? Because we have tried to fill a communication need, to give our customers something positive for their time and attention.

Somewhat the same thing has been done in our Commercial Power Distribution Seminars where architects, consulting engineers, building superintendents, and so on are invited in for a day's discussion and program on all phases of power distribution for commercial buildings.

Now, General Electric claims no patent or rights to any of these ideas. No one is excluded from an idea. Perhaps *you've* got some ideas *we* can use. The point of this creative selling approach is to take whatever ideas are sound and use them for more effective selling.

Industry-Wide Cooperation

My sixth and final approach is industry-wide cooperation. Let's think of the big picture. Once Philip Morris had slipped from 8 per cent of the cigarette market to 7 per cent. Board Chairman Alfred E. Lyon called a meeting with his sales executives. They arrived, arms loaded with programs to win back the 1 per cent. Mr. Lyon listened to them for exactly two minutes. Then he gathered up their papers in one swoop. "Who cares about the 1 per cent," he said. "What I want to know is: How are we going after the 93 per cent?"

Bob Paxton, a General Electric Executive Vice President, put it another way. One of our sales managers was talking about selling 5 per cent of the market. Mr. Paxton reminded him that what he was saying was that out of every 100 people 95 of them were buying something else.

So let's keep in mind the big picture. If we say that industrial electric heating is used in 10 per cent of

the plants in our area, let's remember that out of every 100 plants, 90 of them are using something other than electric heating.

What's keeping us from going after that 90 per cent? Is that ugly word "saturation" slowing you down? We will never reach the saturation point in the electrical industry. There will never be a saturation point of fulfilling human needs, of doing things better, of creating something better to make life more satisfying and productive.

One positive way to beat that bogeyman of saturation is to work together in industry cooperation. Electrical manufacturers can contribute scientific research and engineering, the best in manufacturing skill and a greatly intensified effort in every phase of marketing.

Electric utilities can through planned, consistent, and creative sales effort at the local level bring to your customers the advantages of electric industrial heating for greater production. Consulting engineers, distributors, contractors, and dealers can cooperate by joining in with the other members of the electrical industry in promoting educational programs, the work of this organization and other teamwork projects.

Evidence of Recognition

The very existence of the Industrial Electrification Heating Council and the National Industrial Electric Heating Conference is evidence that you do recognize the interdependence of all segments of your industry and are proceeding to do something about it.

So, in conclusion, I am inclined to agree with Mr. Babson that we are truly entering a third renaissance, an age that beckons us on to greater opportunity, greater daring and greater hope than perhaps any time in the past.

But let us remember that two of the chief ingredients of this new age, atomic energy and automation, were the products of teamwork, of people working together, of closing ranks so that all could benefit. If we are to achieve the greatest good for all of us as well as the customers we serve, we can profit by this example.

If we can "close ranks and sell" in these ten years ahead, then there is literally no limit to the good we can accomplish for all mankind.

C. P. Conrad

C. P. CONRAD, Chairman of the Board and former President of the Iowa-Illinois Gas and Electric Co., died on January 23, 1956, at his home in Davenport, Iowa. Mr. Conrad, whose age was 63, had been ill for several months.

His career combined a wealth of experience in both the civilian and military fields of engineering and public utility management. During World War I, he held the rank of commodore in the Civil Engineers Corps of the Navy and was in charge of constructing air stations on the coast of France.

In 1925 he became chief hydraulic engineer of the Brazilian Traction Light & Power Co. He later became assistant general manager and assistant to the vice president prior to entering the Navy in 1940. He helped develop bases in Central America before World War II and later was director of the Advance Base Department, supporting the Seabees in the Pacific. In recognition of his military service, he was decorated with the Legion of Merit.

Mr. Conrad joined the Iowa-Illinois Co. as its president in 1946 and was made chairman of the board in 1954.

1½ Million Pieces of Educational Literature Distributed by BLBS in 1955

DISTRIBUTION by electric utility companies of educational literature published by Better Light Better Sight Bureau in 1955 more than doubled 1954 use, it was reported recently by H. A. Stroud, Promotion Manager for Monongahela Power Co. and Chairman of the Bureau.

Records show that 1,505,608 pieces of literature were shipped by the Bureau last year, as compared with 709,066 in 1954, Mr. Stroud revealed.

This tremendous growth is indicative of greatly increased interest on the part of the electric industry in lighting education, Mr. Stroud pointed out, as well as a growing acceptance on the part of educators for this type of information.

The major portion of the 1½ million pieces distributed in 1955 was accounted for by the Bureau's four programs of supplementary teaching aids for use in schools. Designed to promote a better understanding of the relationship of light and sight, these programs are entitled, "The Story of Light and Sight" (for 5th and 6th grade elementary classes), "Living with Light" (for 7-8-9th grade science classes), "Lighting for Better Living" (for junior and senior high school Home Economics classes) and the newest of the four, "Working with Light," for Industrial Arts classes.

A need for such information has been expressed by educators because (1) light and lighting are part of every phase of living; (2) no existing courses in the curriculum and no textbooks cover the subject of lighting and its relation to sight, and (3) because the science of lighting and seeing has progressed so rapidly that no textbooks could keep up with it.

The National Education Association, an organization of several million teachers and school administrators, has said in its own publication, "No pupil should leave school without understanding how lighting affects his own efficiency and comfort, or without having some experience in planning good lighting arrangements."

With the Better Light Better Sight Bureau being the only agency offering the teacher classroom study aids covering these subjects, it is understandable that the Bureau's programs continue to grow in use.

Many electric utility companies, as part of a long-range program of public service and education, have made the materials available to schools in their areas. The leaflets, posters, films and other materials are used by the teacher herself, after prior approval has been obtained from the school superintendent or supervisor.

Continued upgrading of these materials is part of the Bureau's program, Mr. Stroud stated, in order to make them most effective and useful. It is hoped that utility companies will continue to expand their programs of making these materials available to the schools.

Five More Resuscitations Win EEI Medals

WITH each award of the EEI resuscitation Medal to an electric company employee is conveyed the tribute of the entire electric industry. The Medal itself attests to a grateful industry's recognition of the personal heroism involved in alert, efficient action that has restored the life of an injured fellow worker.

Yet in the face of tragedy, and often with complete disregard of danger to self, these men put into operation the life-saving practices that they have learned in company safety-programs. In so doing, they honor themselves, their companies, and the industry. In the following pages the BULLETIN summarizes five more cases which have recently merited the EEI Medal. Other cases will be reviewed as their details become available.

JAMES V. HICKMAN
Western Light & Telephone Company, Inc.

A Western Light & Telephone Co., Inc., crew was working at Phillipsburg, Kansas, on the afternoon of April 5, 1955, to rebuild a transformer station. The new pole had been set, arms and secondary brackets attached, and services transferred over to the new secondary brackets. The secondary was energized from transformers on the old pole.

Journeyman Lineman Bobby Lee Burger started up the new pole to run the transformer risers. He was holding the lower secondary conductor bracket on one side of the pole with his left hand so that a bare spot on the jumper to this bracket was in contact with his left wrist above the gauntlet of his leather glove. As Burger reached between the secondary conductors on the other side of the pole, his right wrist made contact with the bare spot on the top conductor where the service wires were made up, thus completing a 240-v circuit from wrist to wrist.

Lineman Arden F. Johnson, who was on the other side of the pole, noticed something was wrong and asked Burger what was the matter. When he got no reply, he noticed that the muscles in Burger's face were drawing up. Johnson immediately reached over the three-wire service and grasped the suspenders on Burger's belt, and reached down and pushed the victim's fingers off the insulator spool. About that time, Burger's knees buckled and his hooks cut out. Johnson could no longer maintain his hold on the suspenders, and Burger fell about 23 feet to the ground.

Line Foreman Dale Reeves, who had run toward the truck to get his climbing tools when he realized something was wrong, saw the victim fall and ran to him. As he straightened Burger's body, Truck Driver James V. Hickman, who had been standing nearby, ran to the scene and immediately started the Back Pressure-Arm Lift method of resuscitation. The artificial respiration was continued for eight to ten minutes before the victim could breathe unassisted.

When Burger was removed to a hospital, he was found to have suffered injuries of the back, the lumbar vertebrae, and knee. An operation and a full body cast were necessary for treatment.

An EEI Medal for James V. Hickman and Certificates of Assistance for Arden F. Johnson and Dale I. Reeves recognized their successful resuscitation efforts. Presentation of the medal and certificates was formally made at a dinner in Phillipsburg, accounts of which appeared in the *Phillips County Review*, September 22, 1955; *Concordia Blade Empire*, September 14, 1955; and *The Kansan* (Concordia, Kans.), September 15, 1955.

H. V. ROBINSON
South Carolina Electric & Gas Company

On the morning of June 9, 1955, in West Columbia, S. C., a South Carolina Electric & Gas Co. crew was transferring distribution wires from old poles to new poles. Atop one of the poles, Lineman H. V. Robinson was working while Groundman Frank Johnson assisted him on the ground.

Across the street, inside the Capitol Bowling Center, D. C. Hite, a local plumber, had climbed a six-foot ladder to disconnect a ceiling-suspended gas heater in the building which was being remodeled. As Hite, with his bare right hand, began to untwist the exposed ends of the wire, his left hand grasped the gas pipe line where it enters the gas heater. He received a 115-volt shock, screamed, and crumbled to the floor unconscious.

Johnson saw the incident through

Seated, left to right, are Arden F. Johnson, James V. Hickman, and Dale I. Reeves, who are credited with saving the life of Bobby Lee Burger (right). Standing are officials of Western Light & Telephone Co., who participated in the presentation ceremony: D. C. Tinker, Vice President; P. S. Kendall, Concordia Division Manager; E. P. Hennek, President; and F. V. Moffett, Phillipsburg, Division Manager.

a breach in the building's wall, and shouted to Robinson, then ran to the accident scene. Arriving there, he turned the victim over and positioned his body for artificial respiration. By this time Robinson had arrived and immediately began the administration of Schafer Prone Method of respiration. Then, at the suggestion of an army nurse who was watching the operation, a change was made to back pressure-arm lift method in which Johnson assisted. When respiration had been underway for about four minutes, the victim could breathe without assistance.

At a hospital, Hite was treated for severe electric shock and for head injuries sustained when he fell to the floor from the ladder.

For their quick-witted and efficient resuscitation action, an EEI Medal was awarded to H. V. Robinson and a Medal Miniature to Frank Johnson. They were presented by F. R. McMeekin, Vice President in Charge of Operations, at the company's monthly safety meeting on November 22, 1955. In its December 1, 1955, edition, the *Columbia Record* carried an account of the ceremonies.

Frank Johnson (left) received an EEI Medal Miniature and H. V. Robinson (right) an EEI Medal for successfully resuscitating D. C. Hite (center).

KAROL SEKELY
Central Hudson Gas & Electric Corporation

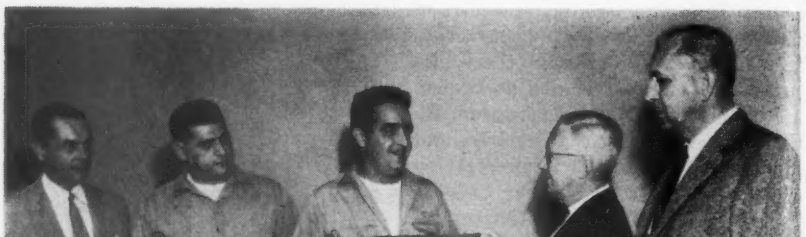
A Central Hudson Gas & Electric Corp. crew was at work on the afternoon of May 19, 1955, at the intersection of Nelson Avenue and Clinton Street in Wappinger Falls, N. Y. Lineman First Class Richard K. Miller was climbing a dirt bank in back of a junction pole when he slipped and grabbed hold of guy wires holding the pole. The lower guy wire was energized at secondary potential while the upper guy was at round potential, causing Miller to become "frozen." Realizing that he was in a state of electric shock, Miller called out and at the same time broke his contact by placing his foot against the guy clamp and forcing himself away from the guy wires. He then fell to the ground, unconscious and not breathing.

Lineman Third Class Karol Sekely, who was working one section away, heard Miller cry out and saw him stagger. Sekely picked up a pair of rubber gloves and called to other members of the crew as he ran to Miller. Upon reaching the victim, Sekely immediately straightened him out and began Back Pressure-Arm Lift artificial respiration. Before Miller exhibited signs of breathing about 10 minutes later, Sekely was relieved by Lineman Stephen J. Dvorsak. Before Miller could breathe unassisted, approximately 20 minutes later, Line-

Holding their EEI Certificates are (left to right) Karol Sekely, who received an EEI Medal, and William Hubbard, Robert M. Quirk, Stephen J. Dvorsak, and Henry R. Brannan, who were awarded Medal Miniatures. Also pictured (left to right) are Ernest E. Althouse, Vice President in Charge of Operations of Central Hudson Gas & Electric; James F. Moore, General Distribution Superintendent; John Cahill, Line Foreman; George J. Ruoff, Safety Director; and Ernest R. Acker, President and General Manager.

man First Class Henry R. Brannan, Jr., Groundman Robert M. Quirk, and Field Clerk William Hubbard also had participated in the administration of artificial respiration. When an ambulance arrived at the accident scene, oxygen was administered to the victim, who was then removed to a hospital where he was treated for electric shock. He was able to return to work in six days.

In recognition of their resuscitation action, Karol Sekely was awarded an EEI Medal while Medal Miniatures were awarded to Stephen J. Dvorsak, Henry J. Brannan, Jr., Robert M. Quirk, and William Hubbard.



Watson F. Tait, Jr. (second from right), Vice President in Charge of Electric Operation, Public Service Electric and Gas Co., congratulates Howard J. Alsdorf (center) on receiving an EEI Medal, while Raymond T. Moock, Division Superintendent, Albert D. Auletta, winner of a Certificate of Assistance, and Arthur R. Nelson, General Superintendent of Distribution, observe.

HOWARD J. ALSDORF

Public Service Electric and Gas Company

In Tenafly, N. J., on June 4, 1955, a Public Service Electric and Gas Co. crew had as its assignment the replacement of a defective crossarm. Chief Lineman Henry C. Vogel, Jr., climbed the pole upon which the work was to be done while Lineman First Grade Howard J. Alsdorf prepared the new crossarm. When Vogel had completed his belting in and the securing of the pulley block, he called down that he was ready for the rubber line hose.

At the foot of the pole, Alsdorf placed four line hoses in the hose bag and was tying the hose bag to the handline when he heard a noise that caused him to look up. He then saw Vogel hanging backward in his safety belt with his knees locked into the pole, his head lower than his knees, and his arms hanging limp. Subsequent investigation led to a belief that Vogel received an electric shock while untying the primary phase wire or in moving this phase wire on the arm after it was untied.

When Alsdorf realized what had happened and as he prepared to climb to Vogel's rescue, he called to Line Helper Albert D. Auletta to summon aid. When he reached the victim, Alsdorf freed Vogel's legs, placing them astraddle his safety belt, and immediately began to administer pole top resuscitation. After approximately ten minutes of artificial respiration, the victim was able to breathe without assistance. Then, with the assistance of a handline held by Auletta and a policeman who had arrived at the scene, Vogel was lowered to the ground.

He was removed by ambulance to a hospital where he was treated for third degree burns.

Howard J. Alsdorf received an EEI Medal and Albert D. Auletta merited a Certificate of Assistance by virtue of their respective performances at the accident scene. These were presented on October 13, 1955, by Watson F. Tait, Jr., company vice president.

KENNETH W. JOHNSON

Southern California Edison Company

The job at Southern California Edison Co.'s unattended unit-type Sharon Substation in LaCrescenta, Calif., included pulling in new cable, installing a pothead, and running jumpers to the disconnected switches for a future 4-kv circuit.

On the afternoon of April 28th, Cable Splicer George F. Petersen was inside the cubicle, sawing off a bolt-end with a metal saw. His left hand was on a pot head terminal when his right shoulder contacted an energized clip of an open 4-kv disconnect switch. There was a flash, and he was thrown out of the cubicle to the ground.

Cable Splicer Kenneth W. Johnson, who was working with Petersen within the cubicle at the time of the accident, immediately began the administration of Schafer Prone Method artificial respiration. Administration of the respiration was continued for about three minutes before there was any sign of breathing, then maintained for another two minutes before the victim could breathe without assistance.

Early in the administration of the respiration, Cable Foreman Philip F. Murphy had rushed to the accident

(*Continued on page* 64)

W. E. Montgomery (right), Southern California Edison's Manager of Operation, presents Medal to Kenneth W. Johnson for successfully resuscitating George F. Petersen (center), as recipients of Certificates of Assistance, Philip F. Murphy and John J. Patchett, look on.

Industry Promotion

(*Continued from page* 47)

tee, Wall Street Journal; Edward G. Gavin, Editor, American Builder; and Edgar Smith, Assistant Managing Editor, Fortune Magazine.

Of the local meetings, that sponsored by The Cleveland Electric Illuminating Co. was largest. Their audience in the Cleveland Music Hall numbered 1,000. The Houston Power & Light Co. entertained Texas businessmen at the Shamrock-Hilton Hotel, and Consolidated Edison Co. of New York, Inc. was host in New York City at the Hotel New Yorker. In some localities, utilities sponsored the show jointly. Others will make use of a kinescope of the show for reshowings.

Double-page ads which are scheduled to appear in eight national magazines during April will help to form the national backdrop for the "Live Better . . . Electrically" promotion. Included in the materials which are available for use on local levels in the campaign are banners carrying the promotion's slogan for use in show windows, a 64-page manual for the building trade on rewiring homes to handle more appliances, specimen newspaper advertisements, and a 30-minute color-sound film, entitled "Meet Mrs. Swenson," for club, school, and civic group showings.

Flood Control

(*Continued from page* 52)

operations is the same. Same product. Same machinery. Same yield. But Table II shows where the money goes.

Note that the power differential is less than $5,000 out of the $364,000 —hardly significant. The agitators who are working so desperately to deceive and confuse the public on the effects of power costs would do well to ponder the full facts as revealed in the above tabulation.

There just aren't any places in New England where multiple-purpose dams can produce cheap hydro power, and anyone who delays or holds up our flood control program on such a basis is guilty of cruel deception.

The Philosophy of Reading

(*Continued from page* 49)

And now, let me conclude with some observations on *how to read.* Read with a definite purpose—according to a plan. Get acquainted with a book before you read it; take a few moments to investigate before you spend a few hours reading. Evaluate what you read—learn to reflect, analyze, challenge, as well as understand.

Keep an open mind as you read; don't limit your reading to what you already know and believe. Study vocabulary as you read—learn more words and the exact meaning of words. Study phrases as well as single words, and learn to avoid clichés. As you read, concentrate. Keep searching for ideas.

Finally, talk about what you are reading. People will listen to what you have to say about the books you are reading. At the same time, talking about books you're reading helps fix the ideas in your own mind and sharpens your ability to analyze the opinions of others.

Utility Public Relations Practices

(*Continued from page* 41)

cially resort communities that need a small industry or two to maintain economic stability in the off season.

Even the larger industrial cities are usually pleased to attract a new industry. To the utility company, a new industry means additional business, but if the people know that the utility company helped bring the new industry to town, it also means improved public relations. Industrial development activity by a utility company therefore must take high rank among examples of "enlightened selfishness."

I have mentioned a few of the things that, for us, have produced good public relations results. The list is far from complete. Perhaps it would be impossible to enumerate all the myriad factors that influence a company's public relations for better or for worse. Fortunately, a company that tries sincerely and intelligently to do a good job for its customers, its employees, and its stockholders is likely to enjoy good public relations if the public understands what it is trying to do—and the American people have proved rather discerning in this respect. Good public relations activities help promote such understanding.

Estimating Meter Readings for Final Bills

(*Continued from page* 54)

convincing the customer that the policy of estimating the final bill is for his convenience and benefit, (3) having a fair adjustment policy covering final bills overestimated, and (4) having capable and trained employees.

Utilities estimating final bills and leaving services energized seem to be well satisfied with the results achieved, both in the over-all economies of operation and better service to customers. In addition, the estimating of final bills is an approach to the problem of final bill collections.

An EEI Customer Accounting Committee recommendation is that utilities study the policy and practice of estimating final bills and states that such a practice appears to be completely justified, not only from the standpoint of collection advantages, but on the basis of the very substantial savings in meter reading costs which can be realized. This, of course, should include leaving services hot to obtain the maximum economies. One can be had without the other but they go together like a horse and carriage.

Personals

Louis F. Eaton, Operating Vice President, Brockton Edison Co., has been elected President to succeed **Walter A. Forbush,** who will continue as a Director and chairman of the board's Executive Committee.

Mr. Eaton, who joined Brockton in 1926, served as assistant to the vice president in Stone & Webster Service Corp.'s Boston office from 1939 to 1942. After two years with Blackston Valley Gas & Electric Co., he joined Montaup Electric Co. as assistant general manager. From 1946 until his 1953 appointment as Brockton's operating vice president, he was Blackston division manager at Woonsocket.

Succeeding Mr. Eaton is **Paul E. Milstead,** Chief Engineer, Tampa Electric Co. Mr. Milstead will have charge of the company's operating departments not including accounting and sales. From 1942 to 1949, Mr. Milstead served Stone & Webster Service Corp., assisting in supervision of all foreign companies and several domestic utilities associated with the firm. He is former general manager, Hoosier Public Utility Co.

Green Mountain Power Corp. has elected **Glen M. McKibben** as President and **G. W. Clewly** as Executive Vice President.

Mr. McKibben, who has been executive vice president for the past year, succeeds the late **John W. Sheehey,** who recently died. A graduate of Oregon State College, Mr. McKibben entered the utility field in 1935 at West Coast Power Co., Portland. He held various administrative and engineering posts with Stone & Webster Corp. and affiliated companies prior to joining Green Mountain in 1954.

Vice president and chief engineer for the past year, Mr. Clewly previously served as chief engineer for Vermont Public Service Commission, and was for several years manager of Newport (Vt.) Electric Co.

J. Harris Ward has been elected Executive Vice President of Commonwealth Edison Co. and its Public Service Co. Division. He will have responsibility for administration of operating and commercial activities.

Mr. Ward, who joined Edison in 1938, was elected secretary in 1948, and was later appointed treasurer. He subsequently served as financial vice president and as commercial vice president for two years each.

Previously, Commonwealth president **John W. Evers** has served as executive vice president of Public Service, and Public Service president **H. P. Sedwick** was executive vice president of Commonwealth. Both men will continue their participation in general management of both companies.

Operation Home Improvement

(*Continued from page* 46)

banner exclaiming "'56 . . . the Year to Fix" and the words, "Operation Home Improvement." A basic advertising and display kit, consisting of the OHI seal decal and reproduction proofs, counter card, window streamer, display poster, newspaper advertising mats, radio and television commercials, suggested news releases, sign painters pattern, and instructional booklet, can be obtained at a cost of $5.00 direct from OHI headquarters at 10 Rockefeller Plaza, New York City.

Magazine Participation

In connection with the campaign, two major meetings have been held with editors and publishers for leading consumer magazines. Home service magazines especially have plans for participation in OHI.

It is believed that many electric light and power companies may wish to join this concerted effort to sell the idea of home improvement by initiating or implementing any such program through their local Chamber of Commerce. It offers excellent opportunities in 1956 to tie-in home wiring through the medium of the HOUSEPOWER program, the new EEI-sponsored wiring program.

Resuscitation Cases

(*Continued from page* 62)

scene and straightened Petersen's body and cleared his mouth. Also, Line Crew Assistant John J. Patchett had run to a phone to seek aid from the Fire Department and to notify the district superintendent. When Patchett returned, he applied pressure massage to the injured man's legs.

Later the victim was removed to a hospital where he was treated for third degree burns of the right upper arm, small scatter burns, and tachycardia.

For their quick and efficient actions, an EEI Medal was awarded to Kenneth W. Johnson and Certificates of Assistance to Philip F. Murphy and John J. Patchett. Presentations were made by W. E. Montgomery, Manager of the Operating Department, at special ceremonies held in Pasadena on September 13, 1955. Accounts of the presentation appeared in the September issue of the company publication *Safety News,* and in local newspapers as follows: *South Pasadena Review,* September 20, 1955; *Pasadena Independent,* September 21, 1955; *Pasadena Ledger* and *Temple City Times,* September 22, 1955; and *Pasadena Star News,* September 23, 1955.

Accounting Conference

(*Continued from page* 38)

The subject of electronics will be more fully covered in an open meeting on Wednesday afternoon, April 18, with a discussion intended to convey to industry a realistic picture of the problems inherent in planning and installing electric computers. A presentation will also be made on "Inside Electronics, 1956" which may be described as a practical look at electronics in use today.

The conference program will include the customary dinner on Tuesday evening, April 17, for the registrants and for the entertainment of the wives and ladies of those attending the conference. A ladies' day committee is planning an interesting program on Tuesday, April 17, which will include a tour of the United Nations, to follow a luncheon in the U. N. Delegates Dining Room.

EDISON ELECTRIC INSTITUTE OFFICERS AND COMMITTEES

OFFICERS

HARLLEE BRANCH, JR., *President*.....Georgia Power Co., Atlanta, Ga.
D. S. KENNEDY, *Vice President*.....Oklahoma Gas & Electric Co., Oklahoma City, Okla.
H. S. BENNION, *Vice President and Managing Director*....420 Lexington Avenue, New York, N. Y.
H. S. SUTTON, *Treasurer*.....Consolidated Edison Co. of New York, Inc., New York, N. Y.
A. B. MORGAN, *Secretary and Assistant Managing Drector*...420 Lexington Avenue, New York, N. Y.

BOARD OF DIRECTORS

(Terms expiring 1956)

D. E. ACKERS.....The Kansas Power and Light Co., Topeka, Kan.
W. C. BECKJORD.....The Cincinnati Gas & Electric Co., Cincinnati, Ohio
JOSEPH M. BELL, JR.....New York State Electric & Gas Corp., Binghamton, N. Y.
WALKER L. CISLER.....The Detroit Edison Co., Detroit, Mich.
B. L. ENGLAND.....Atlantic City Electric Co., Atlantic City, N. J.
R. K. LANE.....Public Service Co. of Oklahoma, Tulsa, Okla.
P. H. MCCANCE.....Duquesne Light Co., Pittsburgh, Pa.
R. E. MOODY.....Union Electric Co. of Missouri, St. Louis, Mo.
HARRY B. MUNSELL.....Kansas City Power & Light Co., Kansas City, Mo.
O. TITUS.....Pennsylvania Electric Co., Johnstown, Pa.
W. O. TURNER.....Louisiana Power & Light Co., New Orleans, La.
G. W. VAN DERZEE.....Wisconsin Electric Power Co., Milwaukee, Wis.
WILLIAM WEBSTER.....New England Electric System, Boston, Mass.
FRANK M. WILKES.....Southwestern Gas and Electric Co., Shreveport, La.

(Terms expiring 1957)

W. J. CLAPP.....Florida Power Corp., St. Petersburg, Fla.
J. E. CORETTE.....The Montana Power Co., Butte, Mont.
C. P. CRANE.....Baltimore Gas and Electric Co., Baltimore, Md.
A. S. CUMMINS.....The California Oregon Power Co., Medford, Ore.
THOMAS G. DIGNAN.....Boston Edison Co., Boston, Mass.
E. W. DOEBLER.....Long Island Lighting Co., Mineola, N. Y.
JOHN W. EVERS.....Commonwealth Edison Co., Chicago, Ill.
C. E. IDE.....The Toledo Edison Co., Toledo, Ohio
S. R. KNAPP.....The Connecticut Light & Power Co., Berlin, Conn.
C. B. MCMANUS.....The Southern Co., Inc., Atlanta, Ga.
R. S. NELSON.....Gulf States Utilities Co., Beaumont, Texas
W. A. PARISH.....Houston Lighting & Power Co., Houston, Texas
HAROLD QUINTON.....Southern California Edison Co., Los Angeles, Calif.
L. V. SUTTON.....Carolina Power & Light Co., Raleigh, N. C.

(Terms expiring 1958)

J. L. BATES.....Central Power & Light Co., Corpus Christi, Texas
A. M. BEEBEE.....Rochester Gas and Electric Corp., Rochester, N. Y.
F. D. CAMPBELL.....Cambridge Electric Light Co., Cambridge, Mass.
C. B. DELAFIELD.....Consolidated Edison Co. of New York, Inc., New York, N. Y.
R. H. FITE.....Florida Power & Light Co., Miami, Fla.
R. H. GERDES.....Pacific Gas and Electric Co., San Francisco, Calif.
N. B. GUSSETT.....Iowa Power & Light Co., Des Moines, Iowa
E. L. LINDSETH.....The Cleveland Electric Illuminating Co., Cleveland, Ohio
D. C. LUCE.....Public Service Electric and Gas Co., Newark, N. J.
M. S. LUTHRINGER.....Central Illinois Public Service Co., Springfield, Ill.
C. E. OAKES.....Pennsylvania Power & Light Co., Allentown, Pa.
H. T. PRITCHARD.....Indianapolis Power & Light Co., Indianapolis, Ind.
K. M. ROBINSON.....The Washington Water Power Co., Spokane, Wash.
L. M. SMITH.....Alabama Power Co., Birmingham, Ala..
HAROLD TURNER.....American Gas and Electric Co., New York, N. Y.

Executive Committee

W. L. Cisler, C. B. Delafield, E. L. Lindseth, D. C. Luce, C. E. Oakes, Harold Quinton, L. V. Sutton, G. W. Van Derzee, William Webster

EDISON ELECTRIC INSTITUTE OFFICERS AND COMMITTEES

ADVISORY COMMITTEE 1955-1956

D. C. BARNES.....Virginia Electric and Power Co.
A. D. BARNEY.....The Hartford Electric Light Co.
J. B. BLACK.....Pacific Gas and Electric Co.
EDGAR H. DIXON.....Middle South Utilities, Inc.
PHILIP A. FLEGER.....Duquesne Light Co.
GEORGE M. GADSBY.....Utah Power & Light Co.
WILLIS GALE.....Commonwealth Edison Co.
ALLEN S. KING.....Northern States Power Co.
J. E. LOISEAU.....Public Service Co. of Colorado
GEORGE L. MACGREGOR.....Texas Utilities Co.
EARLE J. MACHOLD.....Niagara Mohawk Power Corp.
J. W. MCAFEE.....Union Electric Co. of Missouri
LYLE MCDONALD....Public Service Electric and Gas Co.
PAUL B. MCKEE.....Pacific Power & Light Co.
I. L. MOORE.....New England Electric System
W. C. MULLENDORE.....Southern California Edison Co.
GROVER C. NEFF.....Wisconsin Power and Light Co.
J. S. OSBORNE.....Central & South West Corp.
WALTER H. SAMMIS.....Ohio Edison Co.
H. R. SEARING.....Consolidated Edison Co. of New York, Inc.
MCGREGOR SMITH.....Florida Power & Light Co.
PHILIP SPORN.....American Gas and Electric Co.
FRANK M. TAIT.....The Dayton Power and Light Co.
J. B. THOMAS.....Texas Electric Service Co.
E. S. THOMPSON.....The West Penn Electric Co. (Inc.)
J. R. WHITING.....Consumers Power Co.

CHAIRMEN OF EDISON ELECTRIC INSTITUTE COMMITTEES (1955-1956)

ACCOUNTING

Accounting Division Executive, J. C. FARIS.....Union Electric Co. of Missouri, St. Louis, Mo.
Coordinator of Customer Activities, S. A. COLE.....New York State Electric & Gas Corp., Ithaca, N. Y.
Customer Accounting, J. C. LUCHSINGER.....The Cincinnati Gas & Electric Co., Cincinnati, Ohio
Customer Collections, R. B. WILLIAMS.....The Toledo Edison Co., Toledo, Ohio
Customer Relations, H. F. MARTIN.....Long Island Lighting Co., Mineola, N. Y.
Coordinator of General Activities, C. T. DWIGHT.....The Hartford Electric Light Co., Hartford, Conn.
Depreciation Accounting, P. K. READ.....New York State Electric & Gas Corp., Ithaca, N. Y.
General Accounting, R .J. PLOURDE.....The Detroit Edison Co., Detroit, Mich.
Internal Auditing, BIRON GANSER.....Philadelphia Electric Co., Philadelphia, Pa.
Plant Accounting and Property Records, M. B. ROMEISER.....Niagara Mohawk Power Corp., Syracuse, N. Y.
Taxation Accounting, H. M. HOBSON.....Public Service Electric and Gas Co., Newark, N. J.

COMMERCIAL

Commercial Division Executive, O. R. DOERR.....Pacific Gas and Electric Co., San Francisco, Calif.
Commercial Sales Group, R. W. BUTTS.....Ohio Edison Co., Akron, Ohio
Farm Group, BUD S. MOSS.....Georgia Power Co., Atlanta, Ga.
Industrial Power and Heating Group, G. S. YOUNG.....Kansas City Power & Light Co., Kansas City, Mo.
Residential Group, H. H. BRENAN.....Pennsylvania Power & Light Co., Allentown, Pa.
Special Service Group, F. C. PESVEYC.....Public Service Electric and Gas Co., Newark, N. J.

ENGINEERING

Engineering Division Executive, E. L. HOUGH.....Union Electric Co. of Missouri, St. Louis, Mo.
Electrical Equipment, C. L. DERRICK.....The Hartford Electric Light Co., Hartford, Conn.
Hydraulic Power, L. B. CARD.....Public Service Co. of Colorado, Denver, Colo.
Meter and Service, GEORGE J. YANDA.....The Cleveland Electric Illuminating Co., Cleveland, Ohio
Prime Movers, JOHN M. DRISCOLL.....Consolidated Edison Co. of New York, Inc., New York, N. Y.
Transmission and Distribution, GEORGE H. FIEDLER.....Rochester Gas and Electric Corp., Rochester, N. Y.

GENERAL

Accident Prevention, RAYMOND W. WHITE.....Pacific Gas and Electric Co., San Francisco, Calif.
Area Development, JOHN R. FREDERICK.....Wisconsin Power and Light Co., Madison, Wis.
Atomic Power, EDGAR R. DIXON.....Middle South Utilities, Inc., New York, N. Y.
Electric Power Survey, ARTHUR S. GRISWOLD.....The Detroit Edison Co., Detroit, Mich.
Financing and Investor Relations, W. J. ROSE.....American Gas and Electric Co., New York, N. Y.
General Division Executive Committee, D. S. KENNEDY.....Oklahoma Gas & Electric Co., Oklahoma City, Okla.
Industrial Relations, JOHN C. ARNELL.....Consolidated Edison Co. of New York, Inc., New York, N. Y.
Insurance, R. D. CONSTABLE.....Niagara Mohawk Power Corp., Syracuse, N. Y.
Legal, D. BRUCE MANSFIELD.....Ohio Edison Co., Akron, Ohio
Membership, E. S. THOMPSON.....The West Penn Electric Co. (Inc.), New York, N. Y.
Prize Awards, G. W. OUSLER.....Duquesne Light Co., Pittsburgh, Pa.
Purchasing and Stores, W. M. HOLLS.....Baltimore Gas and Electric Co., Baltimore, Md.
Rate Research, C. A. WILLIAMS.....The United Illuminating Co., New Haven, Conn.
Regulation, J. E. CORETTE.....The Montana Power Co., Butte, Mont.
Research Projects, C. W. FRANKLIN.....Consolidated Edison Co. of New York, Inc., New York, N. Y.
Statistical, F. A. KEANE.....Public Service Electric and Gas Co., Newark, N. J.
Tax Policy, C. B. MCMANUS.....The Southern Co., Inc., Atlanta, Ga.
Technical Assistance for Overseas Visitors, HARVEY BUMGARDNER.....The Detroit Edison Co., Detroit, Mich.
Transportation, RANDOLPH WHITFIELD.....Georgia Power Co., Atlanta, Ga.

ight Co.
System
ison Co.
ight Co.
st Corp.
ison Co.
ison Co.
ork, Inc.
ight Co.
tric Co.
ight Co.
rvice Co.
. (Inc.)
wer Co.

uis, Mo.
a, N. Y.
ati, Ohio
do, Ohio
la, N. Y.
d, Conn.
ca, N. Y.
it, Mich.
phia, Pa.
se, N. Y.
rk, N. J.

co, Calif.
on, Ohio
anta, Ga.
City, Mo.
own, Pa.
rk, N. J.

uis, Mo.
d, Conn.
er, Colo.
nd, Ohio
k, N. Y.
er, N. Y.

co, Calif.
on, Wis.
k, N. Y.
it, Mich.
k, N. Y.
ty, Okla.
k, N. Y.
e, N. Y.
on, Ohio
k, N. Y.
urgh, Pa.
ore, Md.
n, Conn.
e, Mont.
k, N. Y.
rk, N. J.
nta, Ga.
it, Mich.
anta, Ga.